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A bibliography, with descriptive abstracts, of articles dealing with research on reading in the content fields is presented. The listing is divided into two parts: a bibliography from research literature which focuses on general content reading skills and an "Other Subjects" bibliography selected from literature dealing with areas other than the basic curriculum areas of mathematics, science, language arts, literature, and social studies. Each bibliography contains two parts: documents from six basic ERIC/CRIER references and documents from a seventh ERIC/CRIER reference providing access to material written on the topics prior to 1950. Each contains an author index. The seven basic ERIC/CRIER references are described, and the availability of documents within each is noted. (JB)

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Research on Reading in the Content Fields: General and Other Subjects

Compiled by
James L. Laffey
Indiana University

RE 001 483

ERIC/CLEARINGHOUSE ON RETRIEVAL OF INFORMATION AND EVALUATION ON READING
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ERIC/CRIER READING REVIEW SERIES

Volume 2 Bibliography 12

Research on Reading in the Content Fields:
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U. S. DEPARTMENT OF HEALTH, EDUCATION & WELFARE
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October, 1968

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The ERIC/CRIER Reading Review Series has been created to disseminate the information analysis products of the Clearinghouse. Analysis of information can take place on a broad continuum ranging from comprehensive reviews of the state of the knowledge in a given area to bibliographies of citations on various topics. Four genres of documents appear in the Reading Review Series. The first type includes bibliographies, with descriptive abstracts, developed in areas of general interest. The second type consists of bibliographies of citations, or citations and abstracts, developed on more specific topics in reading. The third type provides short, interpretive papers which analyze specific topics in reading using the existing information collection. The final genre includes comprehensive state-of-the-art monographs which critically examine given topics in reading over an extended period of time.

Research on Reading in the Content Fields: General and Other Subjects contains two bibliographies. The articles in the General bibliography were selected from the research literature on the basis of their general focus on content reading skills. The articles on the Other Subjects bibliography were selected from the research literature on the content areas other than the four basic curriculum areas of mathematics, science, language arts, and social studies. The two bibliographies are divided into two parts. The first part contains documents selected from six ERIC/CRIER basic references. The second part of each bibliography lists materials from a seventh ERIC/CRIER basic reference in order to provide some access to the literature on the topics prior to 1950. In addition, each bibliography contains an author index. A complete description of the seven ERIC/CRIER basic references and the availability of documents within each reference follows.

ERIC/CRIER BASIC REFERENCE NUMBER 1

Published Research Literature in Reading, 1950-1963, (ED 012 834)

Presents 1,913 citations and annotations on published research literature in reading taken from the annual summaries of investigations in reading compiled on a yearly basis by the Reading Research Center of the University of Chicago. The citations from the annual summaries for 1950-1963 were transferred to magnetic tape which was used to generate a special master for multilithing the publication. Complete bibliographic data for the journal sources used to compile the listing are given. The entries are arranged alphabetically by author in yearly segments. The bibliography covers the complete reading spectrum from preschool to college and adult years and presents research on all aspects of reading, including physiology, psychology, sociology, and the teaching of reading. Complete information on the development of the bibliography is included.

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This reference can be purchased from the ERIC Document Reproduction Service* in microfiche or hard copy format. (Microfiche $1.50 and hard copy $15.92). The ED number listed above must be used in ordering the reference.

The documents reported from this reference have appeared in the published journal literature for the most part and are available in libraries with good journal collections. The documents included from this reference will usually approximate the form of the following samples when they appear in the bibliographies.

4367
Belden, Bernard R. "Utilization of Readability Formulas for Effective Instruction," Problems, Programs and Projects in College-Adult Reading (edited by Emery P. Bliesmer and Ralph C. Staiger), Eleventh Yearbook of the National Reading Conference, (1962), 139-47.

2992
Bergen, Catharine. "The Prevalence of Mathematics in Science from 1900 to 1950," School Science and Mathematics, LI (June, 1951), 443-46.

4291
Martin, Mavis, and Lee, Wayne. "Sample Frequency in Application of Dale-Chall Readability Formula," Educational Research Bulletin, 40 (September, 1961), 146-49.

Note that a four digit number precedes each of the above document citations. This is the ERIC/CRIER identification number for that document. This number can also serve to identify documents from this reference. Documents from Published Research Literature in Reading, 1950-1963 will have numbers from 2882 to 4803 inclusive.

ERIC/CRIER BASIC REFERENCE NUMBER 2

Published Research Literature in Reading, 1964-1966, (ED 013 969)

Presents 849 citations and annotations on published research literature in reading taken from the annual summaries of investi-

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> gations in reading compiled on a yearly basis by the Reading Research Center of the University of Chicago. The citations from the annual summaries for 1964-1966 were transferred to magnetic tape which was used to generate a special master for multilithing the publication. Complete bibliographic data for the journal sources used to compile the listing are given. The entries are arranged alphabetically by author in yearly segments. The bibliography covers the complete reading spectrum from preschool to college and adult years and presents research on all aspects of reading, including physiology, psychology, sociology, and the teaching of reading. Complete information on the development of the bibliography is included.

This reference can be purchased from the ERIC Document Reproduction Service in microfiche or hard copy format. (Microfiche $0.75 and hard copy $7.28). The ED number listed above *must* be used in ordering the reference.

The documents reported from this reference have appeared in the published journal literature and are available in libraries which have good journal collections. The documents selected from this reference will usually approximate the form of the following samples when they appear in the bibliographies.

> 6269
> Barrilleaux, L. E. "An Experiment on the Effects of Multiple Library Sources as Compared to the Use of a Basic Textbook in Junior High School Science," *Journal of Experimental Education*, 35 (Spring 1967), 27-35.
>
> 6273
> Bennett, L. M. and Clodfelter, Cherie. "A Study of the Integration of an Earth Science Unit within the Reading Program of a Second Grade by Utilizing the Word Analysis Approach," *School Science and Mathematics*, 66 (1966), 729-36.
>
> 6367
> Hollenbeck, G. P. "Predicting High School Biology Achievement with the Differential Aptitude Tests and the Davis Reading Test," *Educational and Psychological Measurement*, 27 (1967), 439-42.

Note that a four digit number precedes each of the above document citations. This is the ERIC/CRIER identification number for that document.

This number can also serve to identify documents from this reference. Documents from Published Research Literature in Reading, 1964-1966 will have numbers from 4804 to 5345 inclusive for the years 1964-1966 and numbers from 6253 to 6562 inclusive for the year 1966-1967.

ERIC/CRIER BASIC REFERENCE NUMBER 3

USOE Sponsored Research on Reading, (ED 011 603)

Provides a listing of important research completed on reading and closely related topics. Relevant issues of Research in Education, and Office of Education Research Reports, 1956-65 were reviewed and documents which discussed research on reading and allied topics selected for inclusion. The bibliography provides a comprehensive review of all USOE projects on reading funded by the Bureau of Research since its inception in 1956. Each entry includes citation data, index terms, and a descriptive abstract of the contents of the document. All documents are available from EDRS/NCR. Complete information on microfiche and hard copy prices is included with each document along with the ED number necessary for ordering the document.

This reference can be purchased from the ERIC Document Reproduction Service in microfiche or hard copy format. (Microfiche $0.50 and hard copy $4.24). The ED number listed above must be used in ordering this reference.

The documents reported from this reference have been taken from a more extensive collection reporting USOE sponsored research in all areas of education.* All documents listed from this reference can be ordered in microfiche or hard copy format using the ED number and prices given with each document. They can be ordered from the ERIC Document Reproduction Service at the address listed previously. The documents included from this reference will usually approximate the form of the following samples when they appear in the bibliographies.

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*The complete collection is titled: Office of Education Research Reports, 1956-65, Indexes (OE-12028) $2.00, and Office of Education Research Reports, 1956-65, Resumes (OE-12029) $1.75. Both can be ordered by sending a check or money order to: Superintendent of Documents, U. S. Government Printing Office, Washington, D. C. 20402.

> 6610
> A Comparative Study of Beginning Reading Achievement Under Three Classroom Organizational Patterns--Modified Individualized, Three-to-Five Groups, and Whole-Class Language-Experience.
> By: Marita, Sister M.
> Marquette Univ., Milwaukee, Wis.
> Report Number CRD-2659
> Contract OEC-4-10-263
> ED 003 477 EDRS Price MF-$0.50 HC-$3.16 79P.
>
> 6611
> Reading Achievement in Relation to Growth in Perception of Word Elements in Three Types of Beginning Reading Instruction.
> By: Murphy, Helen A.
> Boston Univ., Mass.
> Report Number CRD-2675 Pub Date: 65
> ED 003 478 EDRS Price MF-$0.50 HC-$4.56 114P.
>
> 6619
> A Study of the Effects of Self-Directive Dramatization on the Progress in Reading Achievement and Self-Concept of the Culturally Disadvantaged Elementary School Children.
> By: Carlton, Lessie & Moore, Robert H.
> Illinois State Univ., Normal
> Report Number CRD-S-190
> ED 003 692 EDRS Price MF-$0.50 HC-$3.32 83P.

Note that a four digit number precedes each of the above document citations. This is the ERIC/CRIER identification number for that document. This number can also serve to identify documents from this reference. Documents from USOE Sponsored Research on Reading will have numbers from 6563 to 6706 inclusive.

ERIC/CRIER BASIC REFERENCE NUMBER 4

Recent Doctoral Dissertation Research in Reading, (ED 012 693)

Lists dissertations completed in colleges and universities since 1960 in the areas of preschool, elementary, secondary, college, and adult reading. Relevant issues of Dissertation Abstracts were reviewed, and dissertations on reading were noted. A comprehensive analytical abstract was prepared by a professional in reading who worked from the summary reported for each dissertation. In many instances the dissertation itself was reviewed in preparing the abstract. As much as possible of the procedures, design, and conclusions of each investigation was included in the abstract. Each entry includes complete bibliographic data. Three hundred seventy-nine theses are listed alphabetically by the author's last name.

This reference can be purchased from the ERIC Document Reproduction Service in microfiche or hard copy format. (Microfiche $2.00 and hard copy $8.84). The ED number listed above must be used in ordering the reference.

Copies of the documents reported from this reference can be ordered from University Microfilms, Ann Arbor, Michigan in positive microfilm or hardbound xerographic form. Complete information for ordering documents is included with each reference. The documents included from this reference will usually approximate the form of the following samples when they appear in the bibliographies.*

5505
Howards, Melvin. "Measuring Children's Understanding of Selected Multiple-Meaning Words as it Relates to Scientific Word Lists," Ph.D., New York University, 1963. Vol. XXVI, No. 2, 905-906. (Order No. 63-6665, Microfilm $3.00; Xerography $5.40, 107 pages.)

5513
Jacobson, Milton Durwood. "Reading Difficulty of Physics and Chemistry Textbooks in Use in Minnesota," Ph.D., University of Minnesota, 1961. Advisers: Clarence H. Boeck, Raymond O. Collier, XXII, No. 11, 3950-51. (Order No. 62-1790, Microfilm $2.85; Xerography $9.90, 218 pages.)

5530
Koester, Paul William. "Reading Science Materials for Two Specific Purposes at the Sixth Grade Level," Ed.D., University of Illinois, 1961. XXI, No. 12, 3717. (L.C. Card No. Mic 61-1631, Microfilm $2.90; Xerography $10.15, 223 pages.)

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*Another compilation of doctoral research related to reading listing theses completed from 1900 to 1960 is also available. The document is available through EDRS. The complete citation and ED number are as follows: Doctoral Studies in Reading, 1900-1960 (Microfiche $0.50, hard copy $3.60) (ED 011 486)

Note that a four digit number precedes each of the above document citations. This is the ERIC/CRIER identification number for that document. This number can also serve to identify documents from this reference. Documents from *Recent Doctoral Dissertation Research in Reading* will have numbers from 5348 to 5727 inclusive.

ERIC/CRIER BASIC REFERENCE NUMBER 5

International Reading Association Conference Proceedings Reports on Elementary Reading, (ED 013 197)

Lists the important papers published in the yearly conference proceedings of the International Reading Association in Elementary Reading since 1960. The complete text of each paper is provided. The 345 papers are presented within the following categories--(1) The Objectives and Goals in Reading, (2) Reading Programs, (3) Teacher Education, (4) Reading Materials, (5) Methods and Grouping, (6) Reading Skills, (7) Early Reading Instruction, (8) Pre-School Reading, (9) Reading Readiness, (10) Reading in the Content Areas, (11) Reading and the Bilingual Child, (12) First-Grade Reading, (13) Linguistics and Reading Instruction, (14) Reading and the Disadvantaged, (15) Reading in Other Countries, and (16) The Diagnosis and Treatment of Reading Difficulty. This bibliography should be useful to practitioners and researchers interested in elementary reading. An author index is included.

This reference can be purchased in microfiche and hard copy format from the ERIC Document Reproduction Service. (Microfiche $4.25 and hard copy $45.48).

The documents contained in this reference can only be ordered as a complete unit from the ERIC Document Reproduction Service. The ED number listed above *must* be used in ordering the document collection. The documents included from this reference will usually approximate the form of the following samples when they appear in the bibliographies.

6138
Bamman, Henry A. "Developing Reading Competencies Through Mathematics and Science," *Reading as an Intellectual Activity*, 8 (1963), 110-12.

6143
Fay, Leo. "Reading Study Skills: Math and Science," Reading and Inquiry, 10 (1965), 92-94.

6152
Larrick, Nancy. "Nature, Science, and Children's Reading," Changing Concepts of Reading Instruction, 6 (1961), 191-93.

Note that a four digit number precedes each of the above document citations. This is the ERIC/CRIER identification number for that document. This number can also serve to identify documents from this reference. Documents from International Reading Association Conference Proceedings Reports on Elementary Reading will have numbers from 5908 to 6252 inclusive.

ERIC/CRIER BASIC REFERENCE NUMBER 6

International Reading Association Conference Proceedings Reports on Secondary Reading, (ED 013 185)

Lists the important papers on junior and senior high school reading published in the yearly conference proceedings of the Association since 1960. The complete text of each paper is provided. The papers are presented within the following categories--(1) Reading Programs, (2) Reading Personnel, (3) Methods and Grouping, (4) Developing Reading Skills, (5) Materials, (6) Reading and Content Areas, (7) Developing Interests and Tastes, (8) Linguistics and the Teaching of Reading, (9) The Library and the Reading Program, (10) Reading and the Bilingual Student, (11) Reading and the Disadvantaged, and (12) The Diagnosis and Treatment of Reading Difficulties. This bibliography should be useful to practitioners and researchers interested in secondary reading. An author index is included.

This reference can be purchased in microfiche or hard copy format from the ERIC Document Reproduction Service. (Microfiche $2.25 and hard copy $23.20).

The documents contained in this reference can only be ordered as a complete unit from EDRS. The ED number listed above must be used in ordering the document collection. The documents included from this reference will usually approximate the form of the following samples when they appear in the bibliographies.

5730
Buehler, Rose Burgess. "Innovations in High School Reading Instruction," Vistas in Reading, 11, Part 1, (1966), 169-71.

5734
Janes, Edith C. "Reading Guidance in Departmentalized Programs," Vistas in Reading, 11, Part 1, (1966), 230-33.

5742
Simpson, Elizabeth A. "Responsibility for Secondary Level Reading Programs," Changing Concepts of Reading Instruction, 6 (1961), 203-06.

Note that a four digit number precedes each of the above document citations. This is the ERIC/CRIER identification number for that document. This number can also serve to identify documents from this reference. Documents from International Reading Association Conference Proceedings Reports on Secondary Reading will have numbers from 5728 to 5907 inclusive.

ERIC/CRIER BASIC REFERENCE NUMBER 7

Published Research Literature in Reading, 1900-1949, (ED 013 970)

Presents 2,883 citations and annotations on published research literature in reading taken from the annual summaries of investigations in reading compiled on a yearly basis by the Reading Research Center of the University of Chicago. The citations from the annual summaries for 1900-1949 were transferred to magnetic tape which was used to generate a special master for multilithing the publication. Complete bibliographic data for the journal sources used to compile the listing are given. The entries are arranged alphabetically by author in yearly segments. The bibliography covers the complete reading spectrum from preschool to college and adult years and presents research on all aspects of reading, including physiology, psychology, sociology, and the teaching of reading. Complete information on the development of the bibliography is included.

This reference can be purchased from the ERIC Document Reproduction Service in microfiche or hard copy format. (Microfiche $2.00 and hard copy $19.92).

The documents reported from this reference have been added as a supplementary section to each of the three bibliographies to aid the researcher interested in earlier research in the two topic areas. The documents in this reference have appeared in the published journal literature and are available in libraries which have good journal collections. The documents from this reference will usually approximate the form of the following samples when they appear in the bibliographies.

> 19
> Beauchamp, Wilbur L. "A Preliminary Experimental Study of Technique in the Mastery of Subject-Matter in Elementary Physical Science," Studies in Secondary Education, I, *Supplementary Educational Monographs*, No. 24. Department of Education, University of Chicago, 1923. pp. 47-87.
>
> 300
> Pollock, C. A. "Children's Interests as a Basis of What to Teach in General Science," *Educational Research Bulletin*, III (January 9, 1924), 3-6.
>
> 2883
> Yoakam, Gerald A. "The Place of Textbooks in Children's Reading," *A Report of the Fourth Annual Conference on Reading, June 28 to July 9, 1948*. Pittsburgh, Pa.: University of Pittsburgh, 1949. pp. 65-75.

Note that a two to four digit number precedes each of the above document citations. This is the ERIC/CRIER identification number for that document. This number can also serve to identify documents from this reference. Documents from *Published Research Literature in Reading, 1900-1949* will have numbers from 2 to 2883 inclusive.

Research on Reading in the Content Fields:
General

3806
Artley, A. Sterl. "Critical Reading in the Content Areas," Elementary English, XXXVI (February, 1959), 122-30.

The development of critical reading through instruction in content areas is discussed. Critical reading is described as the process of judging with severity the ideas expressed by a writer. The following areas are surveyed: the relation of critical to literal reading; factors that predispose a reader to do critical reading in content areas such as intelligence, freedom from biases and prejudices, background of experience, and legitimate purposes for engaging in critical reading; the basic abilities of critical reading; and, where and on what levels critical reading should be developed. It is pointed out that the development of critical reading ability is a responsibility faced by all teachers since it involves both an understanding of the factors that condition a high level of critical reading and a knowledge of the skills and abilities that go into the act of critical analysis for each content area.

4367
Belden, Bernard R. "Utilization of Readability Formulas for Effective Instruction," Problems, Programs and Projects in College-Adult Reading, (edited by Emery P. Bliesmer and Ralph C. Staiger), Eleventh Yearbook of the National Reading Conference, (1962), 139-47.

Readability appraisals of secondary and college-adult textbooks to discover the nature and difficulty of the reading demands on students in various curricula areas are described. The development of readability formulas and the findings of previous readability studies are discussed. Investigations at Oklahoma State University of the readability of state-adopted secondary science textbooks (biology, chemistry, physics) and of seven college-adult reading improvement books are summarized. Readability levels too high for the students using the various texts, particularly in high school biology and chemistry, are reported. Implications of the findings are discussed. A table listing the readability levels of the reading improvement books is included.

5370
Bentall, Grace. "Determination of Critical Levels of Reading Ability for High School Students as Measured by Course Marks and Achievement Test Results," Ed. D., University of Oregon, 1961. Vol. XXII, No. 5, 1458-1459. (Order No. 61-4522, Microfilm $2.75; Xerox $6.40, 132 pages.)

Standardized test scores in reading, mathematics, English, science, social studies, intelligence, and course marks were used to answer three questions: a) Is there a specific level of reading as measured by standardized tests below which academic success at the secondary school level is unlikely? b) To what extent is it crucial that a student maintain a good general reading ability for achievement in basic subjects at ninth and eleventh grade? c) How much is an eleventh-grade student reading at ninth grade handicapped in academic achievement when compared to a ninth-grade student reading at seventh-grade level? Eight hundred thirty ninth- and 720 eleventh-graders were chosen at random from mathematics, English, science, and social studies classes at the two grade levels from nine schools. Results revealed that the percentage of successful students increases with reading proficiency; seventh-grade math and science students appear to be more handicapped by a two-year reading retardation than do students in English and social studies. Correlations between teacher marks, reading scores, achievement scores, and intelligence scores were all positive but generally low indicating that marks were influenced by factors other than these. The use of regression equations using course marks and reading grade indicates that success in ninth grade would be concomitant with a reading range from eighth grade in English to eleventh grade in science. Passing would be likely, even though reading were as low as fourth grade in some subjects. In eleventh grade an eleventh grade reading level seemed to correspond to success in all subjects. Passing would occur even though reading were as low as seventh grade in some subjects. The author concludes that although there is a concomitance between general reading proficiency and success in school it does not establish a causal relationship. Instruction in reading skills needed for a particular subject is the proper province and obligation of the teacher in that area.

4582
Carterette, Edward C., and Jones, Margaret Hubbard. "Redundancy in Children's Texts," Science, 140 (June 21, 1963), 1309-11.

The results of a study of redundancy in children's texts are presented. Reading texts at levels 1, 2, 3, and 5 were compared with each other and with texts intended for adults. Letter redundancy was measured by using a slight modification of Newman and Waugh's method. The sequential constraints of pairs of letters were computed. Information in single letters was about the same for all texts. Redundancy decreased with increasing grade in a regular way, while mean word length increased. A third reader had about the same redundancy as a simple adult text. The constraints in a first reader were considerable. Those in a fifth reader approached those of an average adult text. Tables and references are given.

5403
Cianciolo, Patricia Jean. "Criteria for the Use of Trade Books in the Elementary School Program," Ph.D., The Ohio State University, 1963. XXIV, No. 4, 1498. (Order No. 63-6236, Microfilm $5.75; Xerography $20.50, 451 pages.)

In establishing criteria for the use of trade books in the elementary school, grades one through six, three major dimensions in the teaching-learning situation were identified: selection of trade books to be used in the schools, accessibility of the books, and provision of learning experiences in which trade books are involved. Trade books are books other than textbooks and encyclopedias and may be hardbound or paperbound editions, fiction or nonfiction. Twenty-four criteria were established from the basic point of view evidenced in the investigator's assumptions; from the interpretation of the available literature bearing on aspects of the above-listed dimensions; from observations in a select sampling of classrooms and school libraries in Central Ohio; and from interviews with teachers, librarians, principals, teacher-librarians, and library supervisors. Forty-one persons from 18 schools were interviewed. Major factors for selecting trade books to be used in schools included demographic factors; pupil and teacher reading and study interests; responsibility for selection, selection aids, and frequency of ordering; curriculum areas and teaching methods. Accessibility of trade books was affected most by location of books, professional preparation and efficiency of library personnel, availability of funds, circulation practices, a summer school library program, and the relationship between public library and the school. Criteria established for provision of learning experience involving trade books were: fostering further reading interest in children; using trade books for instructional, recreational, and functional purposes in all curriculum areas; providing opportunities for interpreting what has been read; and evaluating activities in which trade books are involved. These criteria were designed to serve as guidelines in planning in-service programs for educators and librarians.

3711
Cooper, William Hickerson. "Interrelationships Among General and Specialized Reading Abilities and General and Specialized Vocabularies," Dissertation Abstracts, Vol. XV, No. 12, 1955.

The interrelationships among general and specialized reading abilities and general and specialized vocabularies in the reading materials of literature, social studies, and science were examined. Tests assessing levels of intelligence, general silent reading skills, and specialized reading and vocabulary ability in literature, social science, and science were administered to an unspecified number of eleventh graders. Relationships were studied for all reading and vocabularies together with reading and vocabulary in each area separately. High interrelationships were obtained among the four reading abilities and the four vocabularies. Correlations indicated that reading ability in any one subject area is more significantly related to its own specialized vocabulary than to any other vocabulary. Further treatment of the data revealed that academic achievement in each of the three subject areas was more highly related to its own measures of reading ability and vocabulary than to intelligence, general silent reading ability, general vocabulary, or to the specialized reading abilities and vocabularies of other subject areas. The vocabularies were even more highly interrelated than were measures of reading ability which seem to be expressions of total intelligence and language development.

3400
Edgerton, Ronald B. "How Difficult are Children's Encyclopedias? A Second Report," *Elementary School Journal*, LV (December, 1954), 219-25.

A study of the difficulty of the 1953 edition of *Britannica Junior*, of *Compton's Pictured Encyclopedia*, and of the *World Book Encyclopedia* based on an analysis of 100 articles from each encyclopedia is reported. The least difficult of the three encyclopedias was the *World Book*, with 11.2 percent of different uncommon words and a mean grade placement of grade 6.4. The vocabulary lead in *World Book* averaged 6 months lighter than *Britannica Junior's* and 1 year and 6 months lighter than *Compton's*. On average grade placement for sentence length, *World Book* measured 1 school year easier than *Britannica Junior* and 2 school years simpler than *Compton's*. It was concluded that since 1943, the publishers of the three children's encyclopedias have made considerable progress in easing the vocabulary load and shortening the sentence length of their materials. A table showing the grade placement of the 300 articles analyzed according to number of different uncommon words and sentence length is provided. References are included.

4400
Ellingsworth, Huber W. "Teacher Preference for New Items Used as Class Materials," *Journalism Quarterly*, 40 (Winter, 1963), 87-93.

A study of teachers' preferences for news items used as class materials was conducted in two phases at Jackson and Flint, Michigan, during the fall and winter of 1961-62. Subjects for phase I were 24 public school teachers from Jackson (about 18 women and six men). All but two were college graduates; most had completed some graduate work. Experience ranged from 0 to 35 years and teaching level from kindergarten through junior college. A five-factor solution was chosen which encompassed 23 to 24 subjects. Phase II studied 22 teachers from the Flint public school system (14 men and

8 women). All were college graduates with some graduate work. Eight had master's degrees. Teaching experience ranged from 0 to 25 years. A similar method was employed for phase II; identical newspaper items were used. A four-factor solution was chosen for this group.

3010
Faison, Edmund W.J. "Readability of Children's Textbooks," *Journal of Educational Psychology*, XLII (January, 1951), 43-51.

The readability of fifth-, sixth-, seventh-, and eighth-grade textbooks used in two school systems in Washington, D.C., was studied by means of the Flesch readability formula. A modified procedure was followed for the mathematics textbooks. A total of 38 books, one for each grade and subject, were rated on reading ease and human interest. All books showed a progressive decrease in reading ease from the fifth through the eighth grades. The smallest difference was between the seventh and eighth grades. In an overall ranking in reading ease from the most difficult to the easiest, the mathematics books ranked first. They were followed by the history, science, English, and literature books. When ranked from the least interesting to the most interesting, the science books placed first and were followed by the mathematics, history, English, and literature books. An attempt to personalize the contents was apparent only in the mathematics books. Tables and references are included.

4857
Fay, Leo C., Bradtmueller, Weldon G., and Summers, Edward G. "Doctoral Studies in Reading: 1919 Through 1960," *Bulletin of the School of Education*, Indiana University, 40 (1964), 80.

A bibliography of doctoral dissertations from 1919 through 1960 in the area of reading is reported in monograph form. Over 700 studies are classified under 34 subject categories, and a summary statement is included for each category. An author index is provided.

3404
Ginglinger, Genevieve. "Basic Values in 'Reader's Digest', 'Selection' and 'Constellation'," *Journalism Quarterly*, XXXII (Winter, 1955), 56-61.

Content analyses of the French edition of the *Reader's Digest*, *Selection*, and of a competing, native French publication called *Constellation* were compared. The values presented by *Selection* were analyzed in response to criticism that *Selection* presented a false picture of life in the United States. For a 6-month period, five articles were chosen from each issue of both periodicals by a random method. All sentences or paragraphs that implied a value judgment or an evaluation were coded. Findings demonstrated that *Selection* occupied a middle position between the American *Reader's Digest* and the French *Constellation*. The political message of *Selection*, expressed in moral terms as in the *Reader's Digest*, adopted the major themes of American policy. This seemed to explain the criticism that *Selection* was an instrument of American propaganda. It was concluded that *Selection* represented the French as well as the American view of life. References and a table are included.

3730
Gray, William S. "Summary of Reading Investigations July 1, 1956 to June 30, 1957," *Journal of Educational Research*, LI (February, 1958), 401-435.

Ninety-six research articles in reading from July 1, 1956 to June 30, 1957, are summarized under the following headings--(1) the social role and implications of reading--extent of newspaper and magazine reading, content of newspapers, and effect of value of reading, (2) the physiology and psychology of reading--significant interrelationship of factors, perception and vision, reversals, relationship between perceptual and intellectual processes, intellectual or cognitive processes, interests, factors associated with slow learners, personality and emotional factors among non-achievers, interrelationships of aspects of reading among disabled readers, reduction of stuttering in oral reading, and hygiene of reading (3) the teaching of reading--pupil achievement, reading readiness and factors influencing early progress in reading, phonics and word discrimination, vocabulary studies, evaluation of materials, methods, teacher behavior in promoting learning, content fields, mass media, remedial problems at particular grade levels, interests, reading improvement in high school and college, improvement programs for industry and government agencies, readability, and reading tests.

4237
Groff, Patrick J. "Children's Attitudes Toward Reading and Their Critical Reading Abilities in Four Content-Type Materials," *Journal of Educational Research*, 55 (April, 1962), 313-17.

An experiment designed to determine how a child's attitude toward the content of the material being read affects test scores of critical reading is reported. The subjects, 305 fifth and sixth graders of average ability, were given these three attitude questionnaires to complete: Remmers' Scale for Measuring Attitude Toward Any School Subject, Tenenbaum's School Attitudes Questionnaire, and a modified form of Thorndike's Fictitious Annotated Titles Questionnaire.

Four original experimental reading passages and an experimental reading test consisting of reading for immediate recall and of critical reading were administered. Significant differences and coefficients of correlations were obtained between all the experimental and personal variables in the study. Data from the sex groups and the total group were intercorrelated. The findings seemed to indicate that the reading comprehension of an individual child as he reads is influenced to a degree by his attitude toward the content type of material being read. References and tables are included.

4417
Harris, Theodore L. "Summary of Investigations Relating to Reading," Journal of Educational Research, 56 (February, 1963), 283-310.

A summary of investigations relating to reading from July 1, 1961 to June 30, 1962 is presented. The literature related to reading is reviewed under these headings: (1) sociology of reading, (2) psychology of reading, (3) learning processes and functions in reading, (4) research in readability, (5) the physiology of reading, (6) the teaching of reading and, (7) appraisal of reading. References are annotated.

4648
Hopman, Anne, and Yocham, Pearl. "The Dictionary--As Children See It," Elementary English, 41 (April, 1964), 32-33.

An informal study of children's concepts of the dictionary was conducted in one public elementary school of Hammond, Indiana. The study was limited to children's expressions of concepts and records of children's use of the dictionary. An objective measure of skills was not attempted. To obtain an overview of the growth and development of dictionary usage, identical questions were asked of children from a second, a fourth, and a sixth grade. Each class had membership of over 30 pupils. The questions asked were: "What is a dictionary and when do you use it?" and "What do you need to know in order to use a dictionary?". The taped records of children's responses were organized and analyzed according to grade level and question. An additional classroom group of a second, a fourth, and a sixth grade, selected to participate in another type of informal study, kept a log of their use of the dictionary for one week. It was found that as communication needs became greater, the use of the dictionary became more frequent and purposeful. Implications for increasing the effectiveness of the instructional program were indicated. References are given.

2923
Husbands, K. L., and Shores, J. Harlan. "Measurement of Reading for Problem Solving: A Critical Review of the Literature," Journal of Educational Research, XLIII (February, 1950), 453-65.

A review of research and literature on reading for understanding relationships in problem solving is reported. Studies in reading in the content fields point out that beyond the seventh-grade level, reading ability tends to become specific to what is being read. Test makers should consider this in the construction of problem solving tests. Purposeful reading and its relation to reading speed and comprehension are discussed. Critical thinking is inherent in the idea of critical reading. Implications of these ideas for measurement and a bibliography are included.

3118
Johnson, Mary E. "The Vocabulary Difficulty of Content Subjects in Grade Five," Elementary English, XXIX (May, 1952), 277-80.

The understanding of vocabulary in six content fields--arithmetic, geography, history, science, health, and literature--by fifth-grade children in the towns of Hampton and Phoebus, Virginia, was studied. A vocabulary test of 150 multiple-choice items using from one to five meanings per word was constructed from a list of 1,500 fairly difficult words found in fifth-grade textbooks. Words used in the test were checked against the Thorndike List of 30,000 words and against Luella Cole's Technical Vocabulary List. After a preliminary tryout, the test was revised and administered to 684 fifth-grade pupils. The data were analyzed for number of correct responses on each item, relative order of difficulty of words in each of the content areas, and relative order of difficulty of the six subject matter areas. It was concluded from the test results that a program of word enrichment was needed for the understanding of textbooks used in the content subjects because the pupils tested did not seem to be equipped to deal with the vocabularies of the various fields. Tables and references are given.

3959
Karlin, Robert. "Research in Reading," Elementary English, XXXVII (March, 1960), 177-83.

Research studies in elementary, secondary, and adult reading from 1931 to 1957 are surveyed. The studies are discussed briefly under the following categories: 1) reading readiness, 2) phonics, 3) reading interests, 4) influence of comics and television, 5) reading in the content fields, 6) individualized reading, and 7) reading machines. It was concluded from the various investigations that gains in rate of reading could be achieved through programs which included mechanical instruments. However, it was noted that instruction which did not favor machines could not only bring about these same gains, but could also produce superior results. Dependence on expensive equipment to achieve suitable outcomes in reading rate was not recommended. A bibliography is included.

5180
Kingston, A. J. (Ed.) "Research for the Classroom: Improving Study Skills," Journal of Reading, 9 (1966), 343-48.

A survey of research published during the period 1920-65 concerning study habits is presented. Different study habits are compared for effectiveness. Skimming techniques are discussed. Suggestions for helping students improve study skills are given. A bibliography is included.

6388
Kingston, A. J. (Ed.) "Research for the Classroom: Content Textbook: Help or Hindrance?" Journal of Reading, 10 (1967), 408-13.

Research is cited to indicate the formidable reading-learning task presented by the American content area textbook. Criticism refers to the density of concepts, the difficult vocabulary, and the generalized impersonal style of presentation. Texts in mathematics, science, and history have specific problems in readability. Favorable results from modification through rewriting and creative teaching are cited. The evidence gained from research and experimental teaching tends to confirm the contention that the content area textbook, as traditionally used, probably is a real hindrance to the student as a tool for learning. A systematic program of instruction is urged for the development of comprehension-study skills for more successful mastery of all content area textbooks. A bibliography is offered.

3123
Kohler, Richard C. "Use of Arts Activities with Reading, Science, and Arithmetic," Elementary School Journal, LII (February, 1952), 355-59.

A critical analysis of the types of arts activities recommended by textbook writers for use in the teaching of reading, science, and arithmetic is reported. The analysis revealed that 37 types of activities were recommended for integration of the selected subjects.

Distribution of types of activities by grades indicated that types of arts activities were common to all three curriculum areas. Nine types were exclusive to reading and three types to science. None appeared exclusively with the arithmetic program. Findings indicate that a greater variety of types was adaptable to the teaching of reading and science than for the teaching of arithmetic. More different types of activities were suitable for integrated teaching at the primary level than at the upper elementary level. The implications of the study are discussed.

3527
Laycock, Frank. "Significant Characteristics of College Students with Varying Flexibility in Reading Rate: I. Eye-Movements in Reading Prose; and II. Motor and Perceptual Skill in 'Reading' Material Whose Meaning Is Unimportant," Journal of Experimental Education, XXIII (June, 1955), 311-330.

Two experiments were conducted to identify the characteristics of college students with varying flexibility in reading rate and to determine what is responsible for the wide variation in rate increase of the flexible and inflexible readers. In Experiment 1, 37 flexible readers who could shift reading rate easily and 35 inflexible readers were segregated from 391 applicants for admission to a cosmopolitan university following World War II. The two groups were compared on a test requiring them to read two short passages, the first at normal rate, the second as fast as possible without lowering comprehension. Film records made during the test were analyzed for rate, fixation span, duration of fixation, and regressions. The flexible group's eye movement characteristics were superior to the inflexible group, especially rate and fixation span. In Experiment 2, the same readers were given three tests which de-emphasized meaning--(1) irregularly spaced digits at the eye movement cameras, (2) pairs of letters and sentences exposed on the tachistoscope, and (3) 50 pairs of names with slight differences in spelling or punctuation. The flexible group was superior to the inflexible group in nearly all measures. Habitual motor and perceptual behavior was judged an important factor in reading flexibility. The implications of both experiments for reading training programs are discussed. Tables and references are included.

5542
Langston, Genevieve Reitzell. "A Study of the Effect of Certain Structured Experiences in Science, Social Science, and Mathematics on Beginning Reading in Gifted Five Year Olds," Ph.D., University of Illinois, 1964. XXV, No. 2, 1049. (Order No. 64-8405, Microfilm $2.75; Xerography $7.80, 167 pages.)

The effect of 77 reading lessons (Richards and Gibson Methodology) and certain structured experiences in the content areas of mathematics, social science, and science on the oral reading, word knowledge, and word discrimination ability of a group of 48 gifted five-year-old children was investigated. The total group was divided into a control and an experimental group. Both groups were given the reading lessons. Only the experimental group was subjected to the structured experiences in the content areas. Gray's Oral Reading Paragraphs and the Metropolitan Achievement Test were the tests used. The statistical techniques included the use of the Chi Square test, z-scores, and Spearman's coeffiecient of rank correlation. There were no significant differences in oral reading, silent reading of both sentences and paragraphs, word knowledge, or word discrimination.

3125
Lee, Maurice A. "Nature and Causes of the Difficulties of High School Pupils in Reading and Interpreting Four Kinds of Material," Journal of Negro Education, XX (Fall, 1951), 499-512.

Difficulties encountered by Southern Negro high school pupils in interpreting materials in English, history, science, and mathematics were investigated. The findings were correlated with mental ability, general reading ability, interests in school activities, and socioeconomic backgrounds. Subjects were 1,012 ninth- and twelfth-grade Negro pupils attending 12 high schools in Georgia, Florida, and Alabama. Instruments were constructed to measure socioeconomic status and competence in five aspects of interpretation. The scores indicated lower achievement than had been expected, wide overlapping between ninth and twelfth grades, significant variations in the progress of pupils, and wide variations in ability in different interpretative tasks in respective subjects. Pupils ranked higher in quantitative capacity than in linguistic ability. School environment, mental ability, and general reading achievement are most influential in interpretative competence. Interpretative ability was much higher in the laboratory and urban schools than in rural schools. Interests expressed in activities relating to the content areas were slightly negatively correlated with competence in reading passages in those fields. Implications of the findings and problems for further study are given.

4921
Lee, Wayne D. "What Does Research in Readability Tell the Classroom Teacher?" Journal of Reading, 8 (November, 1964), 141-44.

The development of readability formulas is summarized. Techniques of formula validation are described. A list of the most valid formulas is included, and the inadequacies of current formulas are noted. Suggestions for further studies in readability, especially for studies that use tested comprehension as a criterion and for cross-validation studies at upper levels of difficulty, are made.

4105
MacGinitie, Walter H. "Contextual Constraint in English Prose Paragraphs," Journal of Psychology, LI (January, 1961), 121-30.

The contextual constraint within two complete English prose passages differing in content, style, and difficulty was studied by comparing the restoration of words omitted periodically using four omission patterns. Descriptive narratives of 144 words were used with 600 able college students. Approximately 90 percent of the subjects were females; 80 percent were juniors. Subjects were tested in regular classes. Twenty-four classes were in educational psychology; two were in other areas of education. The testing instructions emphasized that each restoration should be an attempt to duplicate the word the author would have used. The score for each subject was the number of restored words in the omission set or subset which exactly matched the originals. The 20 scores for any one omission set were compared with scores for other omission or subsets. Variances, tested by the Hartley test, were homogeneous. The .01 level of significance was used for all comparisons of restoration scores. No statistically significant difference was found in the difficulty of restoring omitted words when every 24th, 12th, or 6th word was omitted, but omitting every third word made restoration more difficult. Data also point to the importance of the proximity of omitted context and indicate that there is a basic limitation in the length of units which can be restored from context. Fourteen references are cited.

4934
McDonald, Arthur S., (Ed.). "Research for the Classroom: Rate and Reading Flexibility," Journal of Reading, 8 (January, 1965), 187-91.

The nature of reading flexibility and some methods of achieving and measuring it are discussed. The correlation of rate flexibility to reading flexibility is considered. It is suggested that reading rate changes do not bring about reading flexibility, but are effects of changes in reading technique. Reading rate changes are shown to be only one aspect of reading flexibility. Students should be taught to vary techniques of reading in order to meet different reading situations rather than merely increasing their reading rate. Other factors involved in reading flexibility, such as facility of association, perceptual freedom, and other attitudinal sets, are indicated. A bibliography is included.

5575
Melis, Lloyd Henry. "The Nature and Extent of Reading Instruction in Science and Social Studies in the Intermediate Grades of Selected School Districts," Ph.D., Northwestern University, 1964. Adviser: Paul A. Witty, Vol XXV, No. 6, 3328. (Order No. 64-12,320, Microfilm $2.75; Xerography $7.60, 162 pages.)

A questionnaire study was designed (1) to determine what reading approaches were employed by teachers for instruction in the fields of science and social studies, (2) to determine what instructional materials were being used in these areas, (3) to determine the relationship between years of teaching experience and the approach taken to teaching reading in the content fields, and (4) to determine the relationship between academic preparation of teachers and the materials and methods used. The questionnaire items were drawn from the recommendations of experts and represented their judgment of "good reading practices" in the content fields. The questionnaires were distributed to 177 teachers. A response of 84.1 percent was obtained. From the findings, the following general conclusions were drawn: (1) The application of "good" reading practices was more frequent at successively higher grade levels. (2) Good reading practices were more commonly found in social studies teaching than in science teaching. (3) Years of experience were not a significant factor in determining the methods employed by teachers. (4) Advanced training and preparation were not significantly related to differences in method. (5) Teachers appeared to follow the recommendations of reading experts in using available materials.

5578
Michaels, Melvin Leonard. "A Study of Similarities and Differences in Student Perceived Reading Difficulties in Selected Secondary School Subjects," Ed.D., Columbia University, 1963. Project Sponsors: Anne S. McKillop, Arno A. Bellack, XXIV, No. 12, 5250. (Order No. 64-4327, Microfilm $3.30; Xerography $11.70, 256 pages.)

A matrix of subject reading difficulties on the secondary level was structured to determine the reading difficulties of individual subjects as actually taught, the extent of commonality and contrast of difficulties, and the effect of varying methods of instruction. Questionnaires were given to 579 senior high school students in English, chemistry, plane geometry, and U. S. history classes asking them to describe usual assignments, explain usual methods of reading assignments, and list major subjects in order of reading difficulty. It was concluded that a teacher's procedures were potent in shaping subject reading difficulties. No fixed generalized syndrome of reading difficulties for a subject could be formulated. A large proportion of students expressed a lack of difficulty. The most pervasive difficulties were those difficulties with comprehension in general, connotationally with inability to combine details into an organized structure, and denotationally because of the concentration of facts and ideas and insufficient vocabulary and background concepts. Lack of interest provided a problem with mental concentration.

5612
Ramsey, Robert Diehl. "An Analysis of the Appropriateness of the Readability and Difficulty of Instructional Materials in a Junior High School," ED.D., University of Kansas, 1961. XXII, No. 11, 3896. (Order No. 62-1869, Microfilm $2.90; Xerox $10.15, 222 pages.)

Seven textbooks used at the junior high school level were evaluated in terms of readability, interest appeal, and conceptual difficulty. Readability was estimated by the Dale-Chall Formula and the interest appeal was evaluated by use of the Flesch Human Interest Index, an interest checklist on sections from the text completed by students, and the percentage of pages devoted to illustrations and the proportion of color and action illustrations. A test was administered to 450 junior high students on a section from each text possessing high interest appeal and low conceptual difficulty and a test over a section from each text with low interest appeal and high conceptual difficulty. The author concluded that all the language arts and social studies texts were judged to be suitably placed in terms of readability and interest appeal. The science text was judged to be grossly inappropriate for its intended reader because of an extremely wide range of reading levels, its high average reading level, and low interest appeal. In all instances the mean scores for the tests over text sections with high interest, low conceptual difficulty were higher than the mean scores for the tests over sections with low interest, high conceptual difficulty. The combination of interest appeal and conceptual difficulty was considered to be a significant determinant of reading success.

3992
Robinson, H. Alan and Dramer, Dan S. "High School Reading--1958," Journal of Developmental Reading, III (Winter, 1960), 94-105.

The role of reading in the high school program is reviewed. Professional literature on junior and senior high school reading is surveyed. Studies are discussed within these areas: (1) flexible classroom organization as an aid to individualized instruction; (2) staff participation in relation to the reading problems of the particular school situation; (3) methods of evaluating reading achievement in content areas through tests, observation, teaching materials, textbook analysis and relating texts to modern literary works. The bibliography includes books and periodical articles which are not mentioned in the summary.

4733
Robinson, H. Alan, and Muskopf, Allan F. "High School Reading--1962," Journal of Developmental Reading, 7 (Autumn, 1963), 7-23.

A summary of the professional literature on junior and senior high school reading for 1962 is given. The main topics under which the literature is categorized include content areas, methods and materials, experimentation, language arts, and underachievers.

4975
Robinson, H. Alan, and Muskopf, Allan F. "High School Reading - 1963," Journal of Reading, 8 (November, 1964), 85-96.

Professional literature on junior and senior high school reading is listed in this sixth annual summary. Reports published in 1963, as well as earlier reports, are included. Several items in the bibliography are mentioned or summarized in the article. The following area are covered in the reports reviewed: reading and the content areas, reading and the language arts, reading interests, recreational reading, reading in relation to the total curriculum, and developmental reading programs.

5627
Root, Paul Ray. "Speed Reading: Its Relation to High School Achievement in English, History, Mathematics, and Science in Hot Springs, Arkansas," Ed.D., University of Arkansas, 1964. Major Professor: R. K. Bent, XXV, No. 3, 1791-1792. (Order No. 64-10,074, Microfilm $2.75; Xerography $4.20, 76 pages.)

The effect of a speed reading course and its relationships with academic grades, sex, socio-economic status of the family, junior high attended, number of children in the family, and grade level of the students were investigated. From an analysis of the findings, the author concluded: (1) The findings indicated no significant difference in gains in grade point average between the two groups in English and mathematics. A significant difference was found, however, in history and science. (2) Sex did not prove to be a contributing factor in English, mathematics, or science. (3) Junior high school attended proved to be significant to the gain in history and science, but not significant in English and mathematics. (4) The number of children in the family proved to be a significant factor only in science. (5) Grade level that the student was in at the time of participation was significant only in science. (6) Socio-economic status proved to be significant to the gain in grade point only in history.

3345
Russell, David H. "The Dimensions of Children's Meaning Vocabularies in Grades Four Through Twelve," University of California Publications in Education, 11 (1954), 315-414.

An investigation of the depth, breadth, and height of the meaning vocabularies of children in fourth through twelfth grades is reported. Breadth of vocabulary was studied in terms of wide-range sampling from science, social studies, mathematics, hobbies and recreations, and also in terms of the number of meanings associated with some words that have multiple meanings. Depth was examined by going beyond the superficial recognition of a synonym to some measure of how much the child understands about certain words. Height of vocabularies was investigated not in terms of total size, but in terms of development from year to year for the 9 years in the study. The book-length study covers the following areas: problems in vocabulary development, sources of research materials on vocabulary and concept development, research in vocabulary development, vocabulary tests of some diagnostic value, problems in vocabulary testing, verbal factors, concept development in childhood and adolescence, the work of Piaget, factors affecting concept and vocabulary development, procedures used in the study, test scores, answers to questions, factor analysis, and conclusions. Appendixes give sample pages from vocabulary tests and tables showing the results of statistical analyses. A bibliography is included.

3783
Schwartz, Marvin. "Transfer of Reading Training from Non-technical to Technical Material," Journal of Educational Psychology, XLVIII (December, 1957), 498-504.

A study to determine if reading training utilizing nontechnical material may transfer positively to the reading of technical material associated with training and occupation was conducted. After receiving training in reading using nontechnical materials 17 of 74 students in pre-flight training at the U. S. Naval School were chosen at random for an experiment in reading training using technical material emphasizing the engineering, physics, and chemistry employed in construction and operation of naval weapons. Comprehension tests accompanied each selection. Pre- and post-tests were utilized for measuring immediate gains, and a retention test was given 12 weeks later. Reading speed for technical material increased 104 percent between the initial and posttraining tests and showed a 92 percent improvement when the initial and retention tests were compared. Comprehension of the material read showed a 7.5 percent decrement when the initial and posttraining tests were compared and a 5 percent decrement when initial and retention tests were compared. Three tables showing mean speed and comprehension scores and summaries of analyses of variance performed on speed and comprehension measures are included. The experiment demonstrated that reading training utilizing nontechnical materials transferred to reading of technical materials. Results indicated that it was not necessary to train readers of technical material utilizing materials from their specialties. Three references are included.

3152
Smith, Lawrence J. "Research Workers in Selected School Subjects," Journal of Educational Research, XLV (December, 1951), 255-273.

The number and authorship of investigations published in reading, arithmetic, spelling, and English prior to January 1, 1949 are described. The data from an earlier study published in 1933 are used and expanded upon. The number of investigations published yearly in each of these fields has increased greatly. Reading produced the greatest number of investigations and the most authors. The first investigation in reading appeared in print in 1884, but by 1912 only 42 had been reported. By 1930 the number had reached 874, and by 1948 a total of 2600 had appeared. At that time 730 authors had published reading articles. Of the 2600 articles published in reading 43.9 percent of them were done by authors who had published but one study. In order to rank in the top 10 percent in productivity in any of the fields, it was necessary to have no more than three or four studies in print. Trends for 3-year periods for all of the fields are reported. Seven references are included.

3789
Spache, George D. "Improving Reading Skills in the Subject Matter Areas," Significant Elements in College and Adult Reading Improvement, (edited by Oscar S. Causey), Seventh Yearbook of the National Reading Conference for Colleges and Adults, (1958), 30-38.

A review of current (1958) efforts in the secondary schools to improve reading skills in the subject-matter areas is made. Twelve secondary reading improvement programs and several summaries of reading improvement efforts are analyzed according to (1) skills and objectives stressed, (2) organization, (3) training materials and devices, (4) research problems in content reading, (5) difficulties in organizing reading improvement programs, and (6) specific suggestions based on existing reading programs, including interesting or valuable techniques.

6502
Stauffer, R. G. "A Vocabulary Study Comparing Reading, Arithmetic, Health and Science texts," The Reading Teacher, 20 (1966), 141-47.

In order to compare vocabularies in basal readers and textbooks in three content areas, four separate word counts were made on seven basic reading series and three textbook series each for science, health, and arithmetic. Word counts were done by education students at the University of Delaware. In reading, words presented for the first time were counted, including variants, compounds, and contractions. In the content areas, every different word in each text was counted, including variants, compounds, and contractions. From these 16 lists, a master vocabulary was derived for each of the four areas. Words were assigned to the level where the greatest number of introductions occurred. Total word counts at different levels were determined, and intralevel and interlevel comparisons were made. Tabulated results show grade level distributions of different words, common words, overlap of vocabularies, and reading words found in content areas materials. These results revealed very little overlap of vocabularies between the series in reading and the three content areas, indicating a lack of uniform vocabulary usage in the four areas. A program of word attack skills which emphasizes meaning and phonetic-structural attack and allows students to read independently in different subject matter areas is needed. Word counts were based on books for the primary level.

4513
Summers, Edward G. "Doctoral Dissertation Research in Elementary and Secondary Reading: 1958, 1959, and 1960," Journal of Developmental Reading, 5, (Summer, 1962), 232-44.

A bibliography of doctoral dissertations appearing in Dissertation Abstracts for 1958 through 1960 relating to elementary and secondary reading is presented. Headings under which research is summarized are intelligence and reading ability, personality characteristics and reading, environment and parental attitudes, reading interests and attitudes, physiological factors in reading, characteristics and comparisons of good and poor readers, predicting reading success, reading readiness, reading programs, teaching methods, basal readers, readability, materials and instructional aids, reading achievement, reading and achievement in other areas, reading in the content areas, word recognition-vocabulary, phonics, reading and listening, teacher preparation-in-service training, diagnosis of reading difficulties-remedial programs, and measurement.

2970
Traxler, Arthur E. "Sex Differences in the Vocabulary of General and Specific Fields in Grades VII to X," Growing Points in Educational Research, 1949 Official Report, American Educational Research Association. Washington: American Educational Research Association, 1949. 146-51.

The need for sex differences in vocabulary in general and specific fields was investigated for classes in grades 7 through 10 of two high schools in Illinois. Subjects were 2,797 pupils, 1,382 boys and 1,415 girls. Separate distributions were made for boys and girls at each grade level in each school. The 150 multiple-choice test items of the vocabulary section of the Diagnostic Reading Tests -- 30 items each from the fields of English grammar, literature, mathematics, science, and social studies -- were used. Means, standard deviations, and differences between means of the two groups and the significance of the difference between means were computed. Only five of the 96 differences showed critical ratios of three or higher, and only 16 were significant at the 5 percent level. It was concluded that sex norms were not needed. Although girls exhibited a small but significant superiority to boys in the vocabulary of English grammar and literature, the study supports previous studies indicating that there are no significant differences in general vocabulary. References are included.

4015
Traxler, Arthur E. "Recent Findings and Trends in Research on Reading," The Reading Teacher, XIII (December, 1959), 90-99.

A review of the research in reading published between 1953-57 is given. About one-fourth of the studies listed in Bulletin No. 75, Research in Reading During Another Four Years, issued by the Educational Records Bureau in the fall of 1957 are summarized. The areas of research covered in this article include: readiness, interests, reading as related to other subjects, reading and television, vocabulary, phonics, tests in a reading program, speed of reading, controlled reading, eye movements, visual defects, auditory and speech defects, dominance and reversals, reading and personality qualities, reading achievement and other factors, typography, diagnosis, remedial and corrective work, developmental reading, adult reading, readability, reading - today and yesterday, and needed research. In the extensive bibliography the exact sources of the articles mentioned in the review are provided.

4521
Townsend, Agatha. "What Research Says to the Reading Teacher: Applied Reading--A Bibliography," The Reading Teacher, 16 (December, 1962), 189-91, 193-94, 201.

Annotated references and a discussion of studies which explore applied reading from 1953 to 1962 are presented. A definition of applied reading is included. The entries are, for the most part, an examination of the performance of pupils in their reading for the content subjects.

5016
Townsend, Agatha. "What Research Says to the Reading Teacher: Reading in the Popular Press," The Reading Teacher, 18 (May, 1965), 671-74.

The accuracy of reading research reported in magazines of general nature and wide circulation is questioned. Nineteen articles which appeared in 13 magazines are described briefly. The topics considered are Initial Teaching Alphabet, learning to read and aspects of readiness, phonics, speedreading, the teaching typewriter, reading textbooks, remedial reading, and disadvantaged children. References from February, 1963, to January, 1965, are included.

5693
Truher, Helen Burke. "Relationship Between Difficulty Levels of Assigned Texts and Reading Ability of Elementary School Pupils," Ed.D., University of Southern California, 1961. XXII, No. 1, 184-185. (Order No. Mic 61-2540, Microfilm $6.75; Xerox $23.85, 529 pages.)

Two hundred and ten pupils in Grades Two, Four and Six were given the Gilmore Oral Reading Test, California Reading Test, Informal Reading Inventory and an informal phonics test and classified into inferior, average and superior readers. The 139 teachers of the students were questioned regarding practices in assigning reading materials. All assigned textbooks were graded by readability formulas. For inferior readers significant differences were found in pupil placements when assigned reading texts were compared with both the oral and informal inventory scores. For average readers significant differences were found between readability levels of reading texts and pupil scores on the silent reading tests. For superior readers levels of reading texts were significantly lower than pupil scores on any of the tests used. Assigned reading texts were read orally by inferior readers with an average of 14 errors 100 words, by average readers with an average of 4 errors and by superior readers with an average of 1 error. Inferior readers scored higher in comprehension of oral reading than either of the other two groups. Published placements for most books matched the school grades in which pupils were enrolled. Mean readability levels of basal texts were not significantly different from the recommended publishers mean grade placement, but individual books differed in placement by more than two school years. Some pupils were assigned texts in content areas more than two years above the level of their reading texts. One-half the teachers included stated that difficulty levels were not suitable for individual pupils. Oral reading was frequently mentioned as an important diagnostic aid by the teachers but standards for it differed. Two-thirds of the teachers disagreed with the criteria of the Informal Inventory for the instructional level of pupils.

6541
Weintraub, S. "What Research Says to the Reading Teacher: Reading Graphs, Charts and Diagrams," The Reading Teacher, 20 (1967), 345-49.

Fifteen references on teaching elementary children to read graphic materials are summarized and discussed.

3376
Wood, Leroy N. "Readability of Certain Textbooks," Elementary English, XXXI (April, 1954), 214-16.

Twelve intermediate-grade science, health, geography, and history books were evaluated by 32 teachers who used the books and were rated by two readability formulas, the Yoakam and the Dale-Chall, for reading level (1) to compare rankings on the same book by different formulas and to compare ranks of books purportedly on the same grade level, (2) to discover teacher opinions about the suitability of the texts for a particular grade level, (3) to compare teacher ratings with the formula ratings, and (4) to compare teacher opinions about the books with number of years of teaching experience. The two readability formulas and the teacher evaluations were in fairly close agreement on the grade level placement of the textbooks. The two formulas tended to be in agreement. The Yoakam formula, because of its relative simplicity, was considered more practical than the Dale-Chall formula. No relationship was found between teacher rating and years of teaching experience. It was suggested that the ratings of readability formulas and teachers' judgments should be used in selecting textbooks. Suggestions for further study are made. A table is included.

5723
Wright, Eugene Stewart. "An Investigation into the Effect of Reading Training on Academic Achievement Among Freshmen in the College of Agriculture, Forestry, and Home Economics," Ph.D., University of Minnesota, 1960. XXI, No. 10, 2955-2956. (L.C. Card No. Mic. 61-685, Microfilm $3.35; Xerox $11.70, 259 pages.)

Three hundred male and female College of Agriculture, Forestry and Home Economics students were randomly divided into experimental and control groups, according to curriculums followed, and the experimental group given a standard course in improvement of reading. Analysis of variance was used to test the significance of the differences in reading gains. Analysis of covariance was used to assess the influence of ACE and initial reading standing on response to reading training. Experimental students made greater gains in reading than did control students. Experimental students did not achieve significantly higher grade-point averages in quantitative type courses but while under certain conditions of grouping and stratification they did achieve significantly greater grade-point averages in verbal-type courses. ACE level appeared to be slightly more important in response to training than did reading ability. The experimental treatment had no observable effect on persistence in college.

5726
Zepp, George Daniel "The Improvement of Reading and Reading-Study Skills in Grades Seven and Eight Through English, History, Geography, and Science," Ed.D., University of Maryland, 1963. Supervisor: Alvin W. Schindler, Vol XXVI, No 1, 218. (Order No. 64-6360, Microfilm $4.10; Xerography $14.40, 320 pages.)

The goals of this study were to identify the basic reading skills and reading-study skills which can be emphasized in subject matter classes, to help teachers formulate ways to assist pupils develop their skills in English, history, geography, and science in regular classes, to show how a curriculum director can work with junior high school teachers in an in-service program, and, to learn if such a program will bring about more than normal reading. In September, silent reading tests, work-study skills tests, and social studies and science achievement tests were administered to all seventh grade pupils in Hanover, Pennsylvania. These pupils were tested again at the end of eighth grade. Monthly planning sessions with the seventh and eighth grade cooperating teachers were concerned with examination, discussion, and study of basic reading skills and reading-study skills, together with techniques and procedures for teaching these skills. The results of the pre- and post-tests were compared on the basis of changes in decile rank. Gains were reported as percent of pupils who gained in silent reading skills, regressed, or showed no change. Data are reported for silent reading skills, word-study skills, social studies achievement, and science achievement. Suggestions for application are made.

Supplementary References, 1900-1949

July 1, 1948 to June 30, 1949

2814
Durrell, Donald D., and Murphy, Helen A. "Research in Reading 1946-1948," Language Arts and the Fine Arts, Review of Educational Research, XIX (April, 1949), pp. 95-106.

Summarizes significant findings of 88 studies published between 1946-8 under such headings as "Special Techniques in Reading," Status Studies," "Reading Disabilities," "Textbook Analysis."

2826
Gray, William S. "Summary of Reading Investigations July 1, 1947, to June 30, 1948," Journal of Educational Research, XLII (February, 1949), pp. 401-37.

Summarizes findings and an annotated bibliography of 89 scientific articles relating to reading.

2874
Traxler, Arthur E. "Research in Reading in the United States," Journal of Educational Research, XLII (March, 1949), 481-99.

Reviews briefly the nature and scope of early research in reading, the broad outlines of reading progress between 1930 and 1948, and basic conclusions concerning fourteen different aspects of reading.

July 1, 1947 to June 30, 1948

2731
Gray, William S. "Summary of Reading Investigations July 1, 1946, to June 30, 1947." Journal of Educational Research,XLI (February, 1948), pp. 401-35.

Presents a summary and annotated bibliography of eighty scientific studies relating to reading.

2751
Ledbetter, Frances Gresham. "Reading Reactions for Varied Types of Subject Matters. An Analytical Study of the Eye Movements of Eleventh Grade Pupils," Journal of Educational Research, XLI (October, 1947), pp. 102-15.

Presents an analysis of the eye-movement records of 60 eleventh grade pupils while reading five 300 word selections from the fields of English, mathematics, science, and social studies which had been equated on various bases.

July 1, 1946 to June 30, 1947

2645
Gray, William S. "Summary of Reading Investigations July 1, 1945, to June 30, 1946," _Journal of Educational Research_, XL (February, 1947), pp. 401-35.

Presents an annotated bibliography of 72 scientific studies relating to reading and summarizes the major conclusions reached.

2698
Traxler, Arthur E., and Townsend, Agatha. "Another Five Years of Research in Reading," _Educational Records Bulletin No. 46_. New York. Educational Records Bureau, 437 West 59th Street, October, 1946. Pp. vi + 192.

Includes an annotated bibliography of 527 references, published between January 1, 1940 and January 1, 1945, and classified under 20 headings. Summarizes important findings in each area.

July 1, 1945 to June 30, 1946

2566
Gray, William S. "Summary of Reading Investigations, July 1, 1944, to June 30, 1945," _Journal of Educational Research_, XXXIX (February, 1946), 401-33.

Includes an annotated bibliography of 70 references and a summary of the significant findings reported.

2576
Krathwohl, William C. "The Importance of Acquiring Reading Skills," _The National Elementary Principal_, XXV (February, 1946), pp. 30-33.

Compares course grades in various subjects made by college freshmen ranking in the lowest and highest quartiles on the basis of scores made on the cooperative reading comprehension test, higher level.

2610
Traxler, Arthur E. "Reading and Secondary-School Achievement," *1946 Achievement Testing Program in Independent Schools and Supplementary Studies*, pp. 59-63. Educational Records Bulletin No. 44. New York. Educational Records Bureau, 1946.

Presents correlations between scores on reading tests of independent school pupils and their scores in English expression, literature, mathematics, science, and history.

July 1, 1944 to June 30, 1945

2495
Gray, William S. "Summary of Reading Investigations, July 1, 1943, to June 30, 1944," *Journal of Educational Research*, XXXVIII (February, 1945), pp. 401-29.

Presents an annotated bibliography of 54 references and summarizes significant findings of the studies reported.

2545
Woodrow, Herbert. "Intelligence and Improvement in School Subjects," *The Journal of Educational Psychology*, XXXVI (March, 1945), pp. 155-66.

Reports the results of a study to determine whether ability to improve in six school skills or subject-matter areas (reading, vocabulary, arithmetic fundamentals, arithmetic problems, English and spelling) is synonymous with intelligence, and if not, if there is any general ability to improve manifested in the gains made.

July 1, 1943 to June 30, 1944

2434
Gray, William S. "Summary of Reading Investigations, July 1, 1942, to June 30, 1943," *Journal of Educational Research*, XXXVII (February, 1944), 401-440.

Presents an annotated bibliography of 114 references and a summary of significant findings.

2462
Reinoehl, C. M. "Time Allotment of School Subjects and Length of School Days," *The National Elementary Principal*, XXIII (June, 1944), pp. 15-18.

Presents data relative to the distribution of time weekly to various elementary school subjects and discusses the implications of the trends revealed.

2479
Betts, Emmett A., and Betts, Thelma Marshall. "An Index to Professional Literature on Reading and Related Topics," New York. American Book Company, 1945. Pp. 138.

Includes 8,278 references published prior to January 1, 1943. Also a topic index under more than 150 different headings.

July 1, 1942 to June 30, 1943

2344
Gray, William S. "Summary of Reading Investigations, July 1, 1941, to June 30, 1942," Journal of Educational Research, XXXVI (February, 1943), pp. 401-44.

Presents a summary and an annotated bibliography of 114 scientific studies relating to reading.

2404
Strang, R. M. "Diagnosis of Difficulty in School Subjects," Review of Educational Research, XII (December, 1942), pp. 485-87.

Summarizes significant findings of scientific studies of reading as a part of a report on the "Diagnosis of Difficulty in School Subjects."

July 1, 1941 to June 30, 1942

2229
Gray, William S. "Summary of Reading Investigations, July 1, 1940, to June 30, 1941," Journal of Educational Research, XXXV (February, 1942), pp. 401-42.

Presents a summary and an annotated bibliography of 114 scientific studies relating to reading.

2269
Robinson, Francis P., and Hall, Prudence. "Studies of Higher-Level Reading Abilities," Journal of Educational Psychology, XXXII (April, 1941), pp. 241-52.

Compares intercorrelations among rate scores and comprehension accuracy scores on art, geology, fiction, Canadian history, and Russian history tests given to 205 college students.

July 1, 1940 to June 30, 1941

2134
Gray, William S. "Reading," Encyclopedia of Educational Research, pp. 891-926. Edited by Walter S. Monroe. New York. MacMillan Co., 1941.

Presents a brief summary of the results of scientific studies of reading published during the last century.

2135
Gray, William S. "Summary of Reading Investigations, June 30, 1939, to July 1, 1940," Journal of Educational Research, XXXIV (February, 1941), pp. 401-43.

Presents an annotated bibliography of 119 studies and summarizes the most significant findings.

2188
Thompson, Ronald B. The Administration of a Program of Diagnosis and Remedial Instruction in Arithmetic, Reading, and Language Usage in Secondary School. Lincoln, Nebraska. Graduate College, University of Nebraska, 1940.

Presents evidence relative to the value of the program and suggests answers to specific questions relating to diagnostic and remedial teaching in high schools.

2193
Traxler, Arthur E., with the assistance of Margaret Seder and the Educational Records Bureau staff. "Ten Years of Research in Reading," Educational Records Bulletin No. 32. New York. Educational Records Bureau, 1941. Pp. vi + 196

Presents an annotated bibliography and a brief summary of the findings of 618 scientific studies of reading published between January 1, 1930 and January 1, 1940.

July 1, 1939 to June 30, 1940

2006
Gray, William S. "Selected References on Elementary-School Instructions. Reading," Elementary School Journal, XL (October, 1939), pp. 132-37.

Includes an annotated bibliography of thirty-one references dealing largely with intermediate and upper grade reading.

2007
Gray, William S. "Summary of Reading Investigations (July 1, 1938, to June 30, 1939)," Journal of Educational Research, XXXIII (March, 1940), pp. 481-523.

Presents an annotated bibliography of 126 references and summarizes the most significant results of the studies reported.

2008
Gray, William S., with the cooperation of Luella Cole, Arthur I. Gates, Ruth Strang, Arthur E. Traxler, and Paul Witty. "Reading," Review of Educational Research, X (April, 1940), pp. 79-106, 154-160.

Presents a summary of findings of major importance of more than 300 scientific studies relating to reading published between July 1, 1936 and June 30, 1939.

2017
Holmes, Henry W. "Research in Reading," Educational Research, pp. 82-113, American Council on Education Studies, Vol. III, No. 10. Washington. American Council on Education, 1939.

Presents a summary of selected examples of research in reading as a part of a broader effort to identify "any common conceptual basis for them or in them."

2032
Masters, Harry G. " A Difficulty Analysis of Basic Readers and the Correlation of Their Content with School Subjects," Pittsburgh Schools, XIV (January-February, 1940), pp. 106-34.

Presents an analysis of the content of fourteen basic readers showing the extent of and correlation with such subjects as geography, history, and science.

2033
Masters, Harry G. "A Difficulty Analysis of Supplementary Readers and Basic Geography and History Texts on the Comprehensive Reading Program - Grades Four to Six," Pittsburgh Schools, XIV (March-April, 1940), pp. 139-66.

Reports the results of a study in grades IV to VI inclusive, to determine the relative difficulty of textbooks in geography, history, and science and of related selections in readers.

July 1, 1938 to June 30, 1939

1854
Bond, Eva. "Reading and Ninth Grade Achievement," Teachers College Contributions to Education, No. 756 (New York. Teachers College, Columbia University, 1938), pp. x + 61.

Summarizes the results of a study among three hundred ninth-grade pupils to determine "the relationship between various reading skills and scholastic achievement in various subject matter areas."

1888
Gray, William S. "Summary of Reading Investigations (July 1, 1937, to June 30, 1938)," Journal of Educational Research, XXXII (March, 1939), pp. 481-517.

Summarizes findings and conclusions of 98 published investigations and reports pertaining to reading.

1909
Kvaraceus, William C., and Wiles, Marion E. "An Experiment in Grouping for Effective Learning," Elementary School Journal, XXXIX (December, 1938), pp. 264-68.

Considers effectiveness in terms of reading achievement of grouping 75 second grade pupils on the basis of proficiency in three subject-matter fields.

1929
Pond, Frederick L. "Influence of the Study of Latin on Word Knowledge," School Review, XLVI (October, 1938), pp. 611-18.

Compares English vocabulary scores of 30 pairs of high-school students matched for sex, C.A., I.Q., school achievement, and semesters of attendance, the experimental group having had from 1 to 5 semesters of Latin.

July 1, 1937 to June 30, 1938

1774
Gray, William S. "Summary of Reading Investigations (July 1, 1936, to June 30, 1937)," Journal of Educational Research, XXXI (February, 1938), pp. 401-34.

Summarizes significant findings and conclusions of ninety-five published investigations relating to reading.

1776
Gray, William S., with the cooperation of Donald D. Durrell, Arthur I. Gates, Ernest Horn, and Paul McKee. "Special Methods and Psychology of the Elementary-School Subjects. Reading," Review of Educational Research, VII (December, 1937), pp. 493-507, 562-67.

Summarizes investigations relating to the psychology and methods of teaching reading in elementary schools published between July, 1934, and June, 1937.

1821
Strang, Ruth, with the assistance of Lord, Lurana, Margolin, Anita J., and Young, Mary Padou. "Bibliography Relating to Reading on the High School and College Level," (The author, Teachers College, Columbia University, 1938), pp. 193.

Includes an extended classified bibliography with annotations covering all phases of reading at the high school and college levels.

1828
Traxler, Arthur E. "Summary and Selected Bibliography of Research Relating to the Diagnosis and Teaching of Reading, 1930-37," Educational Records Supplementary Bulletin A. (New York. Educational Records Bureau. October, 1937), pp. 60.

Includes an annotated bibliography of 283 items together with a brief summary of their major contributions.

July 1, 1936 to June 30, 1937

1683
Gray, William S. "Curriculum Investigations. Reading," Review of Educational Research, VII (April, 1937), pp. 139-42, 199-201.

Summarizes essential findings of 33 studies relating to the curriculum of reading as a school subject.

1684
Gray, William S. "Summary of Reading Investigations (July 1, 1935, to June 30, 1936)," Journal of Educational Research, XXX (April, 1937), pp. 553-76.

Points out the major types of studies reported in a hundred published investigations and summarizes the most important findings.

July 1, 1935 to June 30, 1936

1578
Finck, Edgar M. "Relation of Ability in Reading to Success in Other Subjects," Elementary School Journal, XXXVI (December, 1935), pp. 260-67.

Presents the results of a study in grades IV-VIII, inclusive, which show "that improvement in ability to read is accompanied by improved achievement in those subjects which involve a great deal of reading."

1586
Gray, William S. "Selected References on Elementary School Instruction, Reading," Elementary School Journal, XXXVI (October, 1935), pp. 129-35.

A list of 45 annotated references published between July 1, 1934 and June 30, 1935.

1587
Gray, William S. "Summary of Reading Investigations," Journal of Educational Research, XXIX (February, 1936), 407-32.

A brief summary of investigations relating to reading published between July 1, 1934, and June 30, 1935.

July 1, 1934 to June 30, 1935

1473
Gray, William S. "Summary of Reading Investigations (July 1, 1933, to June 30, 1934)," Journal of Educational Research, XXVIII (February, 1935), pp. 401-24.

Presents a brief summary of the results of investigations relating to reading, followed by an annotated bibliography including 95 references.

July 1, 1933 to June 30, 1934

1353
Clem, Orlie M., and Hovey, Chester W. "Comparative Achievement of Village-School Pupils and Rural-School Pupils," *Elementary School Journal*, XXXIV (December, 1933), pp. 269-72.

Compares marks earned on the Regents' examinations in New York state during the period 1910-31 inclusive by 389 pupils who, following elementary-school graudation, had been enrolled in one of three village high schools.

1380
Gray, William S. "Summary of Reading Investigations (July 1, 1932, to June 30, 1933)," *Journal of Educational Research*, XXVII (April, 1934), pp. 564-91.

Summarizes the important results of 94 scientific studies relating to reading. Annotated bibliography is included.

July 1, 1932 to June 30, 1933

1280
Gray, William S. "Summary of Reading Investigations (July 1, 1931, to June 30, 1932)," *Journal of Educational Research*, XXVI (February, 1933), pp. 401-24.

Presents a bibliography of 118 investigations relating to reading and a brief summary of significant findings and conclusions.

July 1, 1931 to June 30, 1932

1129
Brooks, Fowler D. "Predicting Scholarship in the Junior High School," Eighteenth Annual Conference on Educational Measurements, *Bulletin of the School of Education*, Indiana University, VII, No. 5 (Bloomington, Indiana. Bureau of Cooperative Research, Indiana University, School of Education, 1931), pp. 73-80.

Summarizes the results of studies to determine the relation to scholastic success of various factors including achievement in reading.

1167
Gray, William S. "Summary of Reading Investigations (July 1, 1930, to June 30, 1931)," Elementary School Journal, XXXII (February, March, April, 1932), pp. 447-63, 510-20, 587-94.

Presents a bibliography of 115 scientific studies relating to reading and summarizes significant findings.

1191
McCallister, James M. "Determining the Types of Reading in Studying Content Subjects," School Review, XL (February, 1932), pp. 115-23.

Summarizes the results of observations and analyses the materials and techniques of teaching junior-high-school history, mathematics, and general science to determine the types of reading required.

July 1, 1930 to June 30, 1931

1026
Cole, Robert D. "Educational Achievement in North Dakota City, Town and Rural Schools," School of Education Bulletin No. 9, Departmental Bulletin of the University of North Dakota, Vol. XV, No. 2. Grand Forks, North Dakota. University of North Dakota, 1931, pp. 54.

Compares the achievement of pupils in grades IV-VIII, inclusive, through the use of the new Stanford Achievement Test.

1051
Gray, William Scott. "Summary of Reading Investigations (July 1, 1929, to June 30, 1930)," Elementary School Journal, XXXI (March and April, 1931), 531-46, 592-606.

Presents an annotated bibliography of 107 scientific studies relating to reading and summarizes important findings.

1057
Hewitt, Alden. "A Comparative Study of White and Colored Pupils in a Southern School System," Elementary School Journal, XXXI (October, 1930), 111-19.

Compares the results of the Illinois examination, except the arithmetic test, given to eighty-five white, and to ninety colored, seventh-grade pupils.

1060
Holman, Julius W. "A Study in Time Allotment in the Elementary School Subjects in Missouri," *School and Community*, XVII (April, 1931), 161-65.

Presents tables showing central tendencies and variations in the time allotments for various subjects in grades I-VIII.

1073
McCallister, James M. "Reading Difficulties in Studying Content Subjects," *Elementary School Journal*, XXXI (November, 1930), 191-201.

Classifies according to underlying causes the reading difficulties encountered by pupils in grades VII and VIII in studying American history, mathematics, and general science.

1074
McCallister, James M. "Guiding Pupils' Reading Activities in the Study of Content Subjects," *Elementary School Journal*, XXXI (December, 1930), 271-84.

Describes methods used in five types of guidance in reading in content subjects given to overcome specific difficulties.

July 1, 1929 to June 30, 1930

999
Wilson, W. K., and Ashbaugh, E. J. "Achievement in Rural and Consolidated Schools," *Education Research Bulletin* (Ohio State University), VIII (November 6, 1929), pp. 358-63.

Presents the scores on the Illinois examination of all pupils in grades III-VIII, inclusive, in four consolidated and fifty one-room schools.

July 1, 1928 to June 30, 1929

818
Dvorak, August, and Rae, J. J. "A Comparison of the Achievement of Superior Children in Segregated and Unsegregated First-Grade Classes," *Elementary School Journal*, XXIX (January, 1929), 380-86.

Presents the results of an experiment to determine the progress of superior pupils in segregated and unsegregated first-grade classes.

831
Gray, William S. "Summary of Reading Investigations (July 1, 1927, to June 30, 1928)," *Elementary School Journal*, XXIX (February and March, 1929), 443-57, 496-509.

Presents an annotated bibliography of 101 investigations relating to reading and summarizes the results reported.

880
Thompson, Charles H. "The Educational Achievements of Negro Children," *Annals of the American Academy of Political and Social Science*, CXL (November, 1928), 193-208.

Summarizes and appraises the results of studies of the mental ability and eductional achievement of white and Negro children.

July 1, 1927 to June 30, 1928

717
Gray, William Scott. "Summary of Reading Investigations (July 1, 1926, to June 30, 1927)," *Elementary School Journal*, XXVIII (February, March, and April, 1928), 443-59, 496-510, 587-602.

Presents a bibliography of 113 studies of reading and summarizes the most important findings.

720
Irwin, Elizabeth. "How Much Wood Can a Woodchuck Chuck If He Doesn't Chuck All Day Long," *Progressive Education*, V (April-May-June, 1928), 104-7.

Reports the scores on the Stanford Achievement Test of two groups of pupils with intelligence quotients of 100 or more differing in the amount of instruction received in the formal school subjects.

July 1, 1926 to June 30, 1927

571
Armentrout, Winfield Dockery. "A Comparison of Time Allotments of Subjects in Elementary Training Schools and Elementary Public Schools," *Colorado State Teachers College Bulletin*, Series XXVI, No. 4. Greeley, Colorado. Colorado State Teachers College, 1927, pp. 20

Compares the number of minutes a week allotted to each elementary-school subject in thirty-three training schools and forty-nine public-school systems.

612
Gray, William S. "Summary of Reading Investigations (July 1, 1925, to June 30, 1926)," Elementary School Journal, XXVII (February and March, 1927), 456-66, 495-510.

Summarizes briefly the findings and the conclusions of fifty-six investigations in reading and closely related topics.

631
Kendall, Joseph L. "Progress Above Expectation in the Fundamental Subjects at a School for Mexican Children," Educational Research Bulletin (Los Angeles City Schools), VI (December, 1926), 10-13, 15.

Describes the steps taken to improve the achievement of Mexican children in the fundamental subjects and the progress above expectation made during seven months.

July 1, 1925 to June 30, 1926

536
Gray, William S. "Summary of Reading Investigations (July 1, 1924, to June 30, 1925)," Elementary School Journal, XXVI (February, March, April, May, 1926), 449-59, 507-18, 574-84, 662-73.

Summarizes briefly the findings and conclusions of seventy-three investigations in readings.

542
Livingston, Ralph. "The Interrelations of the Vocabularies in Public-School Subjects," Educational Research Bulletin (Ohio State University), V (May 12, 1926), 208-13.

Reports the results of a comparison of the Pressey technical vocabularies in public-school subjects and the Thorndike word list. Shows overlappings in Pressey's various lists.

July 1, 1924 to June 30, 1925

441
Ayer, Fred C. "Comparative Time Allotments," Studies in Administrative Research, II, 127-47. Bulletin No. 2. Seattle, Washington. Department of Research, Seattle Public Schools, 1925.

Compares the average time allotments for reading and other elementary-school subjects in 1888, 1904, 1914, and 1924.

487
Pressey, Luella Cole. "The Determination of the Technical Vocabulary of the School Subjects," School and Society, XX (July 19, 1924), 91-96.

Reports the results of studies of the technical vocabularies of school subjects. Emphasizes the importance of giving specific attention in teaching to vocabulary problems.

1884 to June 30, 1924

10
Ayer, Fred C. "Average Time Allotments in 49 Large Cities Compared with Seattle," The Elementary School Curriculum, pp. 139-43. Second Yearbook of the Department of Superintendence. Washington. Department of Superintendence of the National Education Association, 1924.

Compares by grades the number of minutes a week allotted to elementary-school subjects in fifty large cities.

165
Henmon, V. A. C. "Improvement in School Subjects Throughout the School Year," Journal of Educational Research, I (February, 1920), 81-95.

Reports the improvement during a year in reading, writing, spelling, and arithmetic in grades II to VI, inclusive.

174
Holmes, Henry W. "Time Distributions by Subjects and Grades in Representative Cities," Minimum Essentials in Elementary-School Subjects--Standards and Current Practices, pp. 21-27. Fourteenth Yearbook of the National Society for the Study of Education, Part I. Chicago. University of Chicago Press, 1915.

Compares time allotments in fifty large cities by subjects and grades.

191
Indiana Educational Commission. "Instruction and Pupil Progress in Elementary Schools," *Public Education in Indiana - A Report of the Indiana Educational Commission*, Chap. I. New York. General Education Board, 1923.

Reports the results and recommendations of a survey of reading and other school subjects in Indiana.

192
Indiana University (Bureau of Co-operative Research, School of Education). "A Co-operative Study of Reading in Sixteen Cities of Indiana," *Indiana University Studies*, No. 37. Bloomington, Indiana. University Bookstore, 1918. Pp. 44.

Presents the results secured through the use of the Gray Oral and Silent Reading Tests in sixteen cities.

196
Jones, Elmer E., and Lockhart, Albert Victor. "A Study of Oral and Silent Reading in the Elementary Schools of Evanston," *School and Society*, X (November 15, 1919), 587-90.

Presents correlations between the results of tests in oral and silent reading in grades III to VII, inclusive.

201
Judd, Charles Hubbard. "Measuring the Work of the Public Schools," Chap. VII. Cleveland. Survey Committee of the Cleveland Foundation, 1916.

Reports and interprets the results of the reading tests given in connection with the survey of the Cleveland schools.

208
Katherine, Sister M. "The Duluth Catholic Public Schools," *Education Bulletins*, No. 12. Washington. National Catholic Welfare Council, 1923. Pp. 48.

Reports the results of a comparative study of retardation facts, intelligence scores, and achievement scores.

220
Kirk, H. H. "Time Distribution by Subject and Grade," *Elementary School Journal*, XXIII (March, 1923), 535-41.

Presents the results of a study of the time allotments in each grade in about thirty "first-class" schools of North Dakota.

230
Latham, Ray. "Time Allotments in Grades 1-6 in the Elementary Schools of 60 Cities," *The Elementary School Curriculum*, pp. 144-46. Second Yearbook of the Department of Superintendence. Washington. Department of Superintendence of the National Education Association, 1924.

Compares the time allotments in minutes a week for the subjects and activities in grades I to VI in sixty cities.

238
Lloyd, S. M., and Gray, C. T. "Reading in a Texas City. Diagnosis and Remedy," *University of Texas Bulletin No. 1853*. Austin, Texas. University of Texas, 1918. Pp. viii + 108.

Analyzes the reading situation in Austin, Texas, diagnoses the difficulties encountered by poor readers, and prescribes remedial treatment.

245
McGaughy, J. R. "Distribution of Grades in Which Elementary-School Subjects are Taught in 375 Cities," *The Elementary School Curriculum*, pp. 146-55. Second Yearbook of the Department of Superintendence. Washington. Department of Superintendence of the National Education Association, 1924.

Compares the grades in which elementary-school subjects are taught in cities of different sizes and in different sections of the country.

259
Merrill, Maud A. "The Ability of the Special Class Children in the 'Three R's,'" *Pedagogical Seminary*, XXV (march, 1918), 88-96.

Reports the results of reading, arithmetic, and handwriting tests given in special classes in Minnesota and in the Minnesota school for feeble-minded.

267
Monroe, Walter S. "Types of Learning Required of Pupils in the Seventh and Eighth Grades and in the High School," *University of Illinois* Bulletin, Vol. XIX, No. 15. Urbana, Illinois. University of Illinois, 1921. Pp. 16.

Reports the major types of textbook study required of pupils in each of eleven school subjects.

273
National Education Association (Research Division). "Facts on Time Allotments for Subjects in Elementary Schools and Junior High Schools," Research Bulletin of the National Education Association, I (February, 1923), 325-37.

Compares the time allotments in Seattle with the time allotments in forty-nine cities (grades I to VIII) and in sixty cities (grades I to VI).

305
Pressey, Luella C. "An Investigation of the Technical Vocabularies of the School Subjects," Educational Research Bulletin, III (April 30, 1924), 182-85. Columbus, Ohio. Bureau of Educational Research, Ohio State University

Reports the results of tabular studies of the vocabularies of various school subjects.

315
Reinoehl, Charles Myron. "Analytic Survey of State Courses of Study for Rural Elementary Schools," Bureau of Education Bulletin No. 42, 1922. Washington. Bureau of Education. Pp. 116.

Summarizes the subject-matter, materials, and time allotments most frequently recommended for rural schools in forty-four state courses of study.

334
Scott, Colin A. "An Eighth-Grade Demonstration Class and the Three R's," Journal of Educational Psychology, X (April, 1919), 189-218.

Reports the results of informal tests to determine the accomplishments of pupils in silent reading and other subjects.

335
Sears, J. B. "Time Allotment in the Schools of Salt Lake City," Educational Administration and Supervision, II (March, 1916), 137-50.

Presents the results of an investigation in Salt Lake City to determine the actual time allotments in each subject and grade.

343
Smith, Bertha M. "Correlation of Ability in Reading with the General Grades in High School." Unpublished Master's Thesis, Department of Education, University of Chicago, 1918.

Reports the results of an investigation among high-school freshmen to determine the relation between reading achievement and school marks.

344
Smith, Bertha M. "Correlation of Ability in Reading with the General Grades in High School," School Review, XXVII (September, 1919), 493-511.

Describes informal tests used in measuring reading accomplishment, presents correlations between reading scores and class marks, and interprets results.

352
Starch, Daniel. "The Measurement of Efficiency in Spelling, and the Overlapping of Grades in Combined Measurements of Reading, Writing, and Spelling," Journal of Educational Psychology, VI (March, 1915), 167-86

Presents the results of tests in three subjects, showing the large amount of overlapping from grade to grade.

417
Whitney, Frederick L. "Intelligence Levels and School Achievement of the White and the Colored Races in the United States," Pedagogical Seminary, XXX (March, 1923), 69-86.

Compares the intelligence levels and school achievement of white and colored children. Gives special prominence to the results secured in the Virginia State Survey.

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Research on Reading in the Content Fields:
Other Subjects

6260
Anderson, J. "The Readability of Australian Newspapers," Australian Journal of Psychology, 18 (1966), 80-83.

To determine the reading difficulty of Australian newspapers, nine daily newspapers and five Sunday papers were analyzed. Reading ease levels were obtained for each newspaper and for six different news categories within each paper with Flesch's Reading Ease Formula. The results suggest that Australian newspapers are not equally difficult reading, since the reading difficulty ranged from seventh-grade to high school or university level. The daily papers differed markedly in difficulty between each other, and the Sunday papers tended to be easier reading than the daily papers. There was no evidence, however, that reading difficulty was influenced by the day of the week, except Sunday. Morning papers were more difficult reading than evening papers, and certain news categories were more difficult reading than others. These results imply that most Australian newspapers require a reading level that approximates a high school or college education. Tables and references are given.

3688
Anderson, Wayne. "Readability of Readers," American Psychologist, XI (March, 1956), 147-48.

General readers in psychology intended for use in combination with regular psychology texts were examined for level of difficulty and interest. Five readers were used: Crow and Crow, Readings in General Psychology; Dennis, Readings in the History of Psychology; Dennis, Readings in General Psychology; Hartley, Birch, and Hartley, Outside Readings in Psychology; and Skinner, Readings in Psychology. Three samples of 100 words each were taken from each article, and a readability score and an interest score were computed. These scores were used to arrive at the mean score and standard deviation of scores for each book. The scores within each book were then correlated to show the relationship between readability and interest. According to Flesch's standards, all the books were difficult. The greatest range of difficulty within a book was in Skinner's book and the smallest range in Dennis' Readings in the History of Psychology. Most articles were mildly interesting to dull. Low correlations were found between readability scores and interest scores. Tables and references are included.

6262
Atkin, K. L. "Media Decision: College Newspaper Versus National Magazine," Journalism Quarterly, 44 (1967), 79-85.

The ability of two media to reach the college market was studied. The impact of the Times College Edition and of the State News was measured with an adaptation of the model recommended by the Advertising Research Foundation. An unrestricted probability sample was gathered from student responses by questionnaire. The sample was classified by sex, marital status, residence at Michigan State University, class, economic status, and ownership of an automobile. Except for the sex dimension, no significance was established for the interaction of the variables studied. The college newspaper remained the most effective medium for national advertiser for reaching the student market.

4181
Baker, Dean C., and MacDonald, James C. "Newspaper Editorial Readership and Length of Editorials," Journalism Quarterly, 38 (Autumn, 1961), 473-79.

A study to determine whether the length of editorials was related to the number of persons who read them was conducted. An examination of the editorials found in The Continuing Study of Newspaper Reading conduct-from 1939 to 1953 by the Advertising Research Foundation was made in terms of length, difficulty, and position. Results were analyzed using the correlation of coefficients; relationships are shown in tabular form. It was shown that limiting the length of editorials or the use of complex words may lose readers rather than attract them. Subject matter and form of presentation apparently have no significant correlation with reported readership. Implications of the study are discussed.

4040
Bentley, Ralph R., and Galloway, R. Edward. "A Comparison of the Readability of Vocational Agriculture Reference Books with the Reading Ability of the Students Using Them," Journal of Experimental Education, XXIX (June, 1961), 373-83.

The readability of widely used agricultural reference books was compared with the reading ability of the vocational agriculture students using them. Twenty-four high schools in 12 vocational agriculture districts in Indiana were selected--one small high school (enrollment of under 100) and one large high school (enrollment of over 100) in each of the districts. Ten reference books were chosen and subjected to the Dale-Chall Readability Formula. The Cooperative English Tests, Test C1, "Reading Comprehension," was used to measure general reading ability, and the Iowa Tests of Educational Development, Test 6, "Ability to Interpret Reading Materials in the Natural Sciences," was used to test ability to read technical materials in agriculture. It was concluded (1) that the vocational agriculture reference books had a mean readability appropriate for students of average reading ability in one of the four high school grades, (2) that twelfth-grade students were characterized by their low reading ability, (3) that reading ability and verbal mental ability did not differ with respect to school size and location, but nonverbal mental ability varied widely among individual schools, (4) that students of vocational agriculture scored higher on the natural sciences reading test than on the general reading test, (5) that the mental ability of the vocational agriculture students was similar to that of their peers, although they scored below their peers in reading ability, and (6) that the agriculture reference books tended to be too difficult for the reading ability of students of vocational agriculture. Tables, a list of the reference books, and a figure are included.

4558
Bhagoliwal, B. S. "Readability Formulae: Their Reliability, Validity and Applicability in Hindi," Journal of Education and Psychology, 19 (April, 1961), 13-26.

A study to determine whether the readability formulae which have been developed for the English language could be applied to the subject matter in Hindi to test and predict its difficulty was conducted. Definitions of "readability" and research on various readability formulae are discussed. Four readability formulae (Johnson, 1930; Flesch, 1948; Farr, Jenkins, and Paterson, 1951; and Gunning, 1952) were applied to material from 31 short stories in four Hindi periodicals. Findings were tabulated on work sheets and statistically analyzed. It was found that the Johnson, Flesch, and Farr, Jenkins, and Paterson formulas yielded reliable and valid results in the prediction of readability. The variables which could best be incorporated into a readability formula for Hindi are reported to be word length and sentence length. Suggestions for further research covering a wide range of Hindi subject matter is made. Tables and references are included.

4564
Bogart, Leo, and Tolley, B. Stuart. "The Impact of Blank Space: An Experiment in Advertising Readership," Journal of Advertising Research, 4 (June, 1964), 21-27.

An experiment in readership was conducted to measure the reader's memory of advertising space when the reader is uncontaminated by previous association with the product, theme, or artwork. The research also seeks to record the effect upon reader perception of changes in the physical appearance of a page, and the shock of an empty space compared with the advertising message in the same spot. Four groups of predesignated subscribers received four specially printed runs of 1,000 papers, three sets with a missing ad on a given page and the fourth set with all three ads missing. A fifth group received regular newspapers containing the test ads in proper position. Telephone recall interviews were conducted with 300 persons in each of five groups, and personal interviews were held with persons receiving the regular paper. The ratio of recognition-to-recall was used as the basis for testing the three hypotheses set forth. Results are presented in tables and discussion. References are listed.

3174
Bou, Ismael Rodriguez. "Spanish Word Count of the Superior Educational Council of the University of Puerto Rico," *Journal of Educational Research*, XLVI (April, 1953), 609-13.

Prior to the word count reported here, the only useful Spanish word count was one prepared by Buchanan which included 1,200,00 running words taken almost wholly from literary sources. The objectives of this word count were (1) to expand the kinds of sources from which words are obtained, (2) to give adequate representation to oral vocabulary and to the vocabulary of contemporary scientific developments, and (3) to help in the establishment of vocabulary norms for writing readers adapted to the needs of Spanish-speaking children in general and of Puerto Rican children in particular. A vocabulary of expression, a vocabulary of recognition, and a vocabulary proper for the elementary grades were identified and obtained from the following sources -- oral vocabulary, free and controlled association, written composition, Rodriguez and Casanova's Word Count, newspapers, radio, religious material, Buchanan's Word Count, basic readers, and supplementary reading books. Although made in Puerto Rico, the count sampled the Spanish language in general and was drawn from a wide sampling of contemporary communications and millions of words taken from children's oral expression.

4566
Braam, Leonard S., and Roehm, Marilyn A. "Subject-Area Teachers' Familiarity with Reading Skills," *Journal of Developmental Reading*, 7 (Spring, 1964), 188-96.

A questionnaire was distributed to obtain a general picture of classroom teachers' awareness of the skills relevant to successful reading in their subject areas. Fifteen schools in New York state participated. Teachers were asked to list the reading skills most necessary in their areas, the skills students performed best, and the skills most deficient. Teachers responded yes or no to questions regarding teacher training in reading, the presence of a reading program in their schools, and the presence of a reading specialist in their schools. The responses, some of them contradictory, were analyzed. It was concluded that communication between reading experts and classroom teachers was not effectively accomplished through the professional writing and teacher training programs or by the reading specialists employed in the schools. A table and references are given.

2998
Brayfield, Arthur H., and Reed, Patricia Aepli. "How Readable are Occupational Information Booklets?" Journal of Applied Psychology, XXXIV (October, 1950), 325-28.

The revised Flesch methods of measuring readability and human interest were applied to sample passages from current occupational information literature covering professional level occupations, skilled and semiskilled level occupations, selected industries, and private business concerns. A total of 78 publications was examined. The reading ease scores revealed that about two-thirds of the publications analyzed ranked "Very Difficult" and 32 percent were "Difficult." The human interest scores yielded almost exactly the same proportions for the "Dull" and the "Mildly Interesting" categories. It was concluded that current occupational information publications fail to meet requirements for comprehension and interest.

4048
Brinton, James E., and McKown, L. Norman. "Effects of Newspaper Reading on Knowledge and Attitude," Journalism Quarterly, XXXVIII (Spring, 1961), 187-95.

The effects of newspaper reading on knowledge and attitudes in Menlo Park, California, were studied. Two groups of respondents were studied to determine their knowledge of and attitude toward possible actions on the fluoridation of the public water supply. Fluoridation was not an issue in Menlo Park. One group, subscribers to the daily Palo Alto Times, was exposed to approximately 200 columns of information about fluoridation during the course of coverage of local fluoridation discussion and election. The other group, nonsubscribers to the Times, was presumed to have been minimally exposed to the same information. The results indicated that subscribers were much more aware of having read about fluoridation in newspapers and that their knowledge of fluoridation was significantly higher than the nonsubscribers. Tables are included.

5384
Brownrigg, Jerry Roy. "Reading Ability of College Drafting Students Compared with Readability of Drafting Textbooks and with Informational Achievement in Drafting," Ed.D. University of Missouri, 1963. Adviser: H. R. London, XXIII, No. 6, 2432. (Order No. 62-5774, Microfilm $2.85; Xerography $9.90, 220 pages.)

In comparing the rated readability of four college drafting textbooks with the reading abilities of 431 college drafting students, 59.87 percent of the students were found to be capable of reading the samples on the thirteenth to fifteenth grade level and 7.43 percent were capable of reading and understanding material on the sixteenth-plus level. Data for the study were gathered through tests and through application of the Dale-Chall Formula of Readability to the selected textbooks. It was found that a small percentage of the material in beginning college drafting textbooks can be read by students with no higher than eighth grade reading abilities, while other parts would require sixteen-plus reading abilities. Beginning college drafting students would require higher reading abilities than those possessed by students in this study in order to read and comprehend the most difficult sections in the textbooks. General, rather than technical, vocabulary used in the textbooks was chiefly responsible for the reading difficulty. A college textbook should have a rated readability of less than the thirteenth grade to be readable by the majority of the students in the study. The "hard-word" factor had a greater effect than the sentence length factor on the readability rating given an engineering drawing textbook. The range of difficulty of samples in a given textbook is important when comparing books with readers since the average readability of the textbook may not always give a true picture of the various sections. Informational Achievement and one's reading abilities have a substantial positive relationship.

2999
Burns, D. G. "An Investigation into the Extent of First-Year Vocabulary in French in Boys' Grammar Schools," British Journal of Educational Psychology, XXI (February, 1951), 36-44.

Achievement in French vocabulary during 1 year and variations in rate of learning were studied in boys' grammar schools. Two types of tests were used--(1) a test of recall in which each item had to be translated, and (2) a multiple choice test. Eight schools gave the tests four times during the year. All groups scored higher in the multiple choice test. Every group but one was able to recall 60 percent or more of vocabulary and to recognize 76 percent or more. Evidence did not allow any conclusions to be drawn regarding absolute rate at which vocabulary increased in comparable groups of pupils. Results are summarized as follows--(1) The mean for seven groups showed 555 items in recall and 718 in recognition vocabulary. (2) For six groups recall was 60 percent of vocabulary encountered, and recognition was 76 percent or more. (3) The greatest increase in both recall and recognition took place in the first term, 55 percent and 74 percent respectively. (4) Recall vocabulary increased 45 percent in the second and third terms, and recogntion, 25 percent. Total items available for recall at the end of the year represented four-fifths of the estimated recognition vocabulary. Results of statistical tests are presented in tables.

3935
Bush, Chilton R. "A System of Categories for General News Content," Journalism Quarterly, XXXVII (Spring, 1960), 206-10.

A detailed classification scheme based on elements of reader interest was developed to aid subject-matter analysis of newspapers. The categories were judged by 18 teachers of journalism experienced in content analysis and were validated in a large-scale content analysis of 12 metropolitan newspapers. It was noted that any set of categories must change to fit the news. The fifty categories are presented and described. A table is included.

3496
Carter, Richard F. "Writing Controversial Stories for Comprehension," Journalism Quarterly, XXXII (Summer, 1955), 319-328.

A study designed to measure the relative effectiveness of a story structure in stimulating comprehension of the important elements in controversial stories is reported. News stories on controversial subjects were structured in three different ways and presented to 59 subjects--14 high school students, 22 male college students, and 23 members of the League of Women Voters in Madison and Middleton, Wisconsin. Analysis of results showed that total comprehension of issues was increased by giving the reader a neutral orientation in the lead paragraph, followed by equal presentation of both sides, with issues divorced from names, especially among subjects who said they read newspapers occasionally for news of public affairs. Total comprehension of names was not significantly changed by varying the three structure types employed in this study. The three forms of structure, subjects discussed, methods of presentation to the subjects, references and tables are included.

3392
Carter, Roy E., Jr. "The Content Response Code: A Pre-testing Procedure," Journalism Quarterly, XXXII (Spring, 1955), 147-60.

The development of a tool for the location of critical or problem areas in communication content which may assist in judicious use of the findings to improve the effectiveness of the specific messages tested, is described. The tool, termed the Content Response Code (CRC), is considered helpful in framing communication policy as related to a specific audience or for complete reconstruction of a given communication program. Subjects were 100 Filipino and 49 Indian nationals attending colleges in the San Francisco area. The sample size ranged from 20 to 40 individuals. Plus and minus tabulations were used to screen content units for reinstatement for followup. Tabulations of responses were made for three basic questions relating the nature of the positive and negative reactions, the specific content reacted to, and the respondent's feeling about the unit. Results were as predicted. On a good-bad scale, the group reading the revised text gave more favorable responses to opinion items, with significant differences in favor of the experimental group. Although further experimentation is recommended, evidence indicates that the CRC is a valid, reliable, and comparatively bias-free method of measurement and analyzes group response to printed content. References are given.

4581
Carter, Roy E., Jr., and Clarke, Peter. "Suburbanites, City Residents and Local News," Journalism Quarterly, 40 (Autumn, 1963), 548-58.

Three aspects of newspaper readership were investigated: (1) identification of patterns of interest in local news, (2) assessment of respondents preferences for sources that provided the best coverage of different kinds of local news, and (3) an examination of how interest in local news and source preferences were related to places of residence, attitudes, and media exposure. The survey was conducted in Minneapolis which is served by two daily newspapers and a Sunday paper. The total area is served by radio, television, and 22 weekly papers circulating in the city and suburbs. Questionnaire and interview methods were used. Interview areas were drawn by probability sampling methods. Actual case interviews were 237. Chi-square, factor analysis, percentage, and contingency correlation coefficients were used to analyze the data. Source preferences differed for city and suburban dwellers and for disruptive and integrative news. When greater interest was shown in integrative news, more use was made of newspapers. Interest in disruptive news and choice of the best source for this content were unrelated to each other, unrelated to time spent reading the paper, and unrelated to weekly newspaper reading. References are included.

4828
Carter, Roy E., Jr., and MacDonald, Neil. "Recognition Responses as Related to More General Reader Claims," Journalism Quarterly, 41 (Autumn, 1964), 578-80.

A survey designed to determine the interest in and regularity of reading particular sections of the Sunday edition of a large Midwestern metropolitan daily is described. The effect of taking respondents through an elaborate readership interview on their subsequent estimates of usual readership and interest are analyzed. Results indicated no significant effect of the readership interview.

4595
Columbia Journalism Review Staff Report. "Smoking and News: Coverage of a Decade of Controversy," Columbia Journalism Review, II (Summer, 1963), 6-12.

An analysis of smoking and the news coverage given it was undertaken to determine whether the public was being given a full, fair, balanced account of the evidence, how responsibly the institutions of journalism were handling the acceptance of cigarette smoking, and whether the performance of journalism was good enough to eliminate the suspicion that its news policies were affected by tobacco advertising. It was determined that news and information media of the United Stated have treated the smoking-and-health issue in ways ranging from courageous and outspoken to indifferent. Magazines have offered the most thorough and well-organized presentations of all media. Newspapers have presented satisfactory coverage in the aggregate; however, the fragmented stories have created confusion. Broadcasting coverage has been equivalent to coverage of other subjects; documentary presentations have been bypassed, except by C.B.S. Journalism organizations have assumed little initiative on the question of tobacco advertising. Both the tobacco industry and governmental bodies have moved more swiftly toward restriction than have institutions of journalism which have largely adopted a wait-and-see attitude. Suppressing news of the controversy for advertising's sake, if present at all, has played a secondary role to other factors. A chronological review of major developments is included.

4597
Columbia Journalism Review Staff Report. "What the Readers See: How a Sample of Newspapers Treats Washington News," Columbia Journalism Review, 1 (Spring, 1962), 21-23.

Seventeen daily papers ranging in size from a circulation of 2,000,000 to less than 8,000 were checked on selected days in September, October and November, 1961, for coverage of Washington news. Only two subjects in the three days, the September 6 and November 1 stories on nuclear testing, belonged in the must category. The attention paid by the papers to Washington news was examined. Detailed treatment of the possible stories was seldom provided by the majority of papers. A number of possible questions is raised concerning the reason for only partial coverage of Washington news. A breakdown of statistics for newspapers and headline stories is given in tabular form.

5408
Condie, LeRoy. "An Experiment in Second-Language Instruction of Beginning Indian Children in New Mexico Public Schools," Ph.D., University of New Mexico, 1961. XXII, No. 8, 2713-2714. (Order No. 61-5268, Microfilm $2.75; Xerography $7.00, 148 pages.)

The classes of rural public school kindergarten and pre-first-grade teachers were utilized to explore the possibility that the achievement of beginning Indian children in learning oral English and readiness for reading could be improved when teachers were trained in effective techniques of second-language instruction. The groups taught by the teachers the year prior to the experiment served as control groups. The experimental program included a list of 2,053 words as the goal of second-language instruction, extensive picture libraries especially prepared for the introduction of vocabulary, three-dimensional objects, use of tape recorder and filmstrips, games, finger plays, picture books, blocks, flannel boards, phonograph records and other aids. The teacher attended scheduled workshops at a university where methods of second-language instruction were demonstrated. Picture vocabulary tests were administered periodically providing an indication of pupil progress. The control groups taught under improvised techniques the previous year were compared to the experimental groups by use of the Metropolitan Readiness Test given to all groups after one year of instruction. The author concluded that, on total reading scores, three of the four groups compared showed significant differences in favor of the experimental program.

4837
Curry, Robert R. "How Popular Is Reading Instruction?" *New Concepts in College-Adult Reading* (edited by Eric L. Thurston and Lawrence E. Hafner), 110-18. Thirteenth Yearbook of the National Reading Conference, 1964.

The importance of developing reading skills is noted. The increase in studies during the twentieth century pertaining to reading and the concern of parents with their children's ability in reading are discussed. A number of studies reporting reading popularity as a school subject is related. A study of 43,979 fifth-grade students throughout the United States revealing reading popularity is described. A breakdown of responses by sex, georgraphic area, and state is presented in tables. A number of references is included.

4601
Danielson, Wayne A., and Bryan, Sam Dunn. "Readability of Wire Stories in Eight News Categories," *Journalism Quarterly*, 41 (Winter, 1964), 105-06.

An analysis of the readability of news stories is described. Over 400 stories were taken from the North Carolina Associated Press Teletypesetter Wire during two 4-day periods in 1962 and 1963 and were examined by a readability formula devised for computers. A division of stories into hard news (war, defense and diplomacy, business and economics, public moral problems, and politics and government) and soft news (human interest, sports, accidents and disasters, and crime) was made. Hard news stories were more difficult reading matter than soft news stories. A discussion of the findings is provided.

5096
Dasbach, Anita Mallinckrodt. "U.S.-Soviet Magazine Propaganda: *America Illustrated* and *USSR*," *Journalism Quarterly*, 43 (Spring, 1966), 73-84.

The nature and effectiveness of United States-Soviet propaganda were studied within the context of changing East-West relations. A quantitative analysis of *America Illustrated* and *Soviet Life* was done with the 1960 issues and updated with a survey of the 1963 issues of the magazines. The analysis of propaganda themes, subject matter, and negative comment indicated shifts as well as consistencies. Neither of the magazines overtly categorized the "enemy" as bad or weak. Instead, both concentrated on building a self-image of goodness and strength. The magazines showed considerable consensus regarding the various subject matter areas treated. The United States publication *America Illustrated* had the broadest coverage. Both magazines gave predominance to arts and culture subject matter. Negative sentences about contemporary self-images, including some of direct self-criticism, accounted for only a small portion of the content in both magazines. It was concluded that *America Illustrated* magazine had a threefold task -- (1) building an audience under difficult conditions, (2) correcting Soviet misunderstandings about the United States, and (3) promoting the push toward freedom of thought and creative expression within the confines of communism. Tables and references are given.

4057
Deutschmann, Paul J. *News-Page Content of Twelve Metropolitan Dailies*. E. W. Scripps Company and Michigan State University, Communications Research Center, 1959.

A study sponsored by Scripps-Howard Research of the newspage content of a dozen metropolitan newspapers to demonstrate the nature of qualitative differences in the papers is reported. The following daily papers were analyzed every other weekday in the first 4 weeks of March 1959: (1) New York City--*Times*, *Herald Tribune*, *World-Telegram-Sun*, *Post*, *Journal American*, *News*, *Mirror*; (2) Cleveland--*Plain-Dealer*, *News*, *Press*; (3) Cincinnati--*Enquirer*, *Post-Times-Star*. News items in each issue analyzed were classified according to form, geographic origin and area of reader interest, city-room classification as daily story, regular feature, followup, etc., kinds of persons the items were about, and content of the story. These newsroom dimensions were recorded for each of some 25,000 newspage items appearing in 144 issues of the 12 papers studied. Attention was focused on more than 200,000 inches of newspage and editorial material. Statistical comparisons of each category were made among individual papers and between the New York City papers and the Ohio papers. Results of the investigation are discussed in detail. Tables and figures are included.

4219
Diener, Thomas F., and Kaczkowsky, Henry R. "Readability of Occupational Information," *Vocational Guidance Quarterly*, IX (Winter, 1960-61), 87-89.

Three different types of occupational literature were appraised by means of the Yoakam readability formula which is based on weighted vocabulary to ascertain the value of a readability formula in determining the readability of occupational materials. Ten selections were randomly selected from the following: *Occupational Outlook Handbook*, *Chronicle Occupational Briefs*, and *Career Opportunities*. Occupational information tended to be difficult. However, the completeness of coverage of an occupation and the validity of the facts should be considered along with readability in appraising the value of occupational information. References are given.

3007
Dunlap, Carolyn Callis. "Readability of Newspaper Items and of Basic Reading Material," *Elementary School Journal*, L (May, 1950), 499-501.

To determine the readability of newspaper content, samples from an issue of the *Cumberland* (Maryland) *Evening Times* and from the eighth-grade basic reader, *Wonders and Workers*, were analyzed using the Dale-Chall readability formula. Each sample had 100 or more consecutive words. A comparison of the results for each group showed that the newspaper samples had longer but half as many sentences as did the textbook samples. While the newspaper samples had more difficult words, both groups had ninth-grade median reading levels with a range extending from the 5th through the 15th grade for the newspaper samples and from the 5th through the 12th grade for the textbook samples. Therefore, the eighth-grade reader and the newspaper sampled here are of equal reading difficulty as predicted by the Dale-Chall readability formula.

4061
Edelstein, Alex S., and Larsen, Otto N. "The Weekly Press' Contribution to a Sense of Urban Community," *Journalism Quarterly*, XXXVII (Autumn, 1960), 489-98.

The major conclusions of Morris Janowitz's study of the urban community and its weekly newspaper were retested. The degree to which the content of the weekly newspaper serves to integrate the individual and the group into the community structure and the functioning of the newspaper as a communication system were studied. A content analysis of a 6-month file of the urban weekly North Central Outlook, a free-distribution newspaper delivered to 21,000 households in a high-density residential area in Seattle, Washington, was made. Field work was carried out in an area-cluster design. Information gathered through interviews with adults was classified into two typologies: newspaper orientation, or the degree of exposure to newspaper content, and community orientation as measured by stability of residence, image of the community, and social participation. The measures of stability of residence and community identification demonstrated a positive relationship of newspaper orientation to community orientation. Attention to the newspaper was diffused widely throughout the population. A high degree of attention and loyalty to the urban weekly paper was demonstrated. A strong relationship between what was read and what was discussed was evident. The influence of marital and family status as determinants of newspaper reading was not determined clearly. The present study revealed that size of family was not strongly related to newspaper orientation. The developing theory that the urban weekly newspaper operates in a social function for the community was supported. Tables and references are provided.

4177
Editor & Publisher, "65% of Dailies' Readers Roam from Front to Back," 94 (December, 1961), 15-16.

Findings of a national study of newspaper reading habits made by Audits and Surveys Company for the Newsprint Information Committee are summarized. Data from a questionnaire answered by a weighted sample of 1,889 gave information on the following topics: how a paper is read (from front to back, page by page, etc.), how often, where, when, the effect of education on newspaper reading, the effect of age, the range of interest and the differences in interest and reading habits between men and women, the thoroughness of reading, and the clipping of newspaper items.

3828
Ellison, Jerome and Gosser, Franklin T. "Non-Fiction Magazine Articles: A Content Analysis Study," Journalism Quarterly, XXXVI (Winter, 1959), 27-34.

A content analysis of nine general magazines for the period September to November 1947 and the same period in 1957 was made to determine changing preferences in subject matter, writing style, and article length. The magazine sample, This Week, Life, Saturday

Evening Post, Readers' Digest, New Yorker, Atlantic, Coronet, Saturday Review, and Ladies' Home Journal, was selected to include examples of weeklies, monthlies, and the Sunday newspaper field. The 1,153 articles by 692 authors were examined and classified into 10 general areas: overseas reporting, national, regional, and community reporting, family, household, and child management, personal affairs, physical, mental, spiritual health, personality sketch or profile, firsthand experiences, science and technology, sports and entertainment, crime, and the arts, history and cultural miscellany. Style of presentation was distributed among three categories: narrative, interview, and expository. Article length was divided into five categories ranging from 1,500 words or less to 4,500 words and over. Findings are given for individual magazines. Most articles in both samples were written by freelance authors. No shift toward brevity was found; articles of over 4,500 words were the most popular length in 1947, and were even more popular in 1957. A pronounced increase was found in articles on personal management, physical, mental, and/or spiritual. There was a sharp drop in biographical articles except for biographies of criminals. The narrative style was heavily favored in both samples. No gains and some decreases in the number of scientific articles were found. Figures are included.

3829
Engel, Gerald, O'Shea, Harriet E. and Mendenhall, John H., " 'Projective' Responses to a News Article: A Study in Aspects of Bias," Journal of Psychology, XLVI (October, 1958), 309-17.

The possibility that a statement may elicit varying responses from people of different backgrounds was investigated. It was hypothesized that (1) people read and interpret statements dissimilarly depending upon their ego-involvement and that (2) the direction of interpretation of ambiguous reading matter is determined by the existing bias of the individual. An article, "Jews and Alcohol," was presented to eight groups--Catholic students, Jewish students, Protestant students, an English class, graduate psychology students, Protestant clergy, rabbis, and alcoholic patients. After reading the article, four multiple choice questions were answered by the subjects. One question was designed to test the reading comprehension of the subjects. The others were so constructed that they could not be answered solely on the basis of the information presented in the article. After answers to the questionnaire were tabulated, the proportion of responses in each category was compared to the mean of these proportions for all groups by the use of Chi-square. The findings are presented in tabular form and are discussed. The two hypotheses apparently were supported by the data. It was strongly suggested that the journalistic use of ambiguous statements may appeal to the existent biases of the readers and lead, if anything, to the strengthening of prejudice.

4225
Feinberg, Mortimer, Long, Louis, and Rosenheck, Viola. "Results of a Mandatory Study Course for Entering Freshmen," Journal of Developmental Reading, V (Winter, 1962), 95-100.

An experiment to determine whether the reading and study skills of freshmen could be significantly improved through instruction and laboratory practice is reported. A noncredit Freshman Study Methods Course was required of all entering freshmen at The City College's Bernard M. Baruch School of Business and Public Administration. The course was comprised of a weekly 50-minute lecture on study methods and a weekly 50-minute period of laboratory training in reading and study skills. Sixty-four pairs of students were used in the experiment. The experimental group students, entering in February, 1960, were matched with the control group students, entering in September, 1959, on the following variables: sex, type of high school attended, the Entrance Composite which included the high school average and entrance examination scores. The following measures were used to ascertain the effect, if any, of the Study Course: the grades at the end of the first semester, scores on the Brown-Holtzman Survey of Study Habits and Attitudes, and scores on the Appel Personality Inventory and on the Verbal part of the Scholastic Aptitude Test. Correlations for the scores of the two groups did not produce any statistical difference. The conclusions drawn from the study are discussed. A list of references is provided.

3105
Flesch, Rudolph. "Reader Comprehension of News Stories: Further Comment," Journalism Quarterly, XXVIII (Fall, 1951), 496-97.

The Flesch Readability Formula was applied to two versions of a news story. The selection shown to be more widely comprehended was rated slightly easier according to the Reading Ease Score and considerably higher in Human Interest Score. It was concluded that the difference in readability of the two versions of the story, especially in the degree of human interest, produced the sizable increase in comprehension. Other factors in the news stories which may have contributed to the differences in comprehension are cited. Two references are included.

5461
Galloway, Robert Edward. "A Comparison of the Reading Difficulty of Vocational Agriculture Reference Books with the Reading Ability of the Students Using Them," Ph.D., Purdue University, 1960. XXI, No. 7, 1846. (L. C. Card No. Mic 60-6108, Microfilm $2.50; Xerox $7.60, 163 pages.)

Sections of the Coop English Tests, the Iowa Tests of Educational Development, and the Verbal Battery of the Lorge-Thorndike Intelligence Tests were administered to 760 vocational agriculture students in four grades in twenty-two cooperating schools. Ten commonly used vocational agriculture textbooks were analyzed using the Dale-Chall Readability Formula. Analysis of variance was used to test for significant differences in readability of the ten books and the reading and mental ability of the students using them. The author concluded that careful consideration should be given to the reading ability of vocational agriculture students when selecting reference books for their use. In light of the variation of reading ability found within any one class, it seems unwise to use a single reference book for all students. The suggestion is advanced that vocational agriculture teachers be trained in the basic principles of reading instruction.

5126
Gold, D., and Simmons, J. "News Selection Patterns Among Iowa Dailies," _Public Opinion Quarterly_, 29 (1965), 425-30.

Variation or lack of variation among relatively small newspapers was investigated in a study of 24 Iowa evening daily newspapers that received only the Iowa-Nebraska circuit service of the Associated Press (AP). An extensive content analysis was made of all wire stories used by each paper during a 10-day sample from a 5-week period. The total wire copy sent by the AP was also analyzed. The entire story was considered as the unit of analysis, and each story was classified into one of 13 subject-matter types. It was found that the 24 Iowa daily papers differed very little from each other or from AP in the relative emphasis they chose to give different types of material received over the AP wire, regardless of the amount of AP wire copy used. Other findings are discussed. It is noted that this similarity in patterns of news emphasis may represent similarity of news judgments or uncritical acceptance of AP patterns. References and tables are included.

4074
Goldish, Sidney S. "How Editors Use Research on the Minneapolis Dailies," _Journalism Quarterly_, XXXVII (Summer, 1960), 365-72.

Research done at the request of and for the editors of _The Minneapolis Star_ and _Tribune_ is described. The ground rules governing the research conducted by the research department are defined. Research studies on the two newspapers themselves are divided into three areas: (1) public opinion and attitude studies for publication, (2) readership studies, and (3) audience and competitive media studies. Examples are given of the diversified nature of the research department's work in the market, consumer, and opinion fields, as well as in readership research. The methods used in gathering data are described. The variety of ways in which the editors use the collected information are described.

3729
Goldsmith, Adolpho O. "Comprehensibility of Initials in Headlines," Journalism Quarterly, XXXV (Spring, 1958), 212-15.

An investigation was made to determine how well initials in newspaper headlines are understood by newspaper readers. Ten newspaper headlines were selected which contained initials judged to be in general use--(1) USSR, (2) UCLA, (3) YM-YWCA, (4) C of C, (5) ICBM, (6) VIP, (7) AFL-CIO, (8) NAACP, (9) AAUW, and (10) NATO. Adult newspaper readers in suburban St. Louis, Missouri, and journalism students at the State University of Iowa were selected for the study. Half of each group was shown the initials in headlines and the other half was shown the initials alone. It was found that those interviewed had a mean knowledge of 63 percent of the initials alone and a mean of 60 percent for the initials in headlines. It was concluded that headline writers are overestimating the ability of readers to understand initials used in headlines and that initials are either comprehended or not, regardless of context. Tables are included.

4630
Greenberg, Allan, and Garfinkle, Norton. "Delayed Recall of Magazine Articles," Journal of Advertising Research, 2 (March, 1962), 28-31.

Recall of articles printed in three leading magazines was investigated on the basis of interviews conducted with single girls aged 17-24 at 2- and 4- week intervals after the magazines were published. Retention was measured by unaided recall, recognition, and correct identification of content. Sharp differences in the extent of interest of the respondents in the different articles were indicated. The average levels of unaided recall and of correct content identification were similar, but only one-half as high as the average level of recognition. It was indicated that the strictest measure of retention of content was provided by unaided recall plus correct answers to specific questions on content. Little or no decline in recall was found when interest was high between two and four weeks after reading, and a closer relation between recognition and unaided recall for the more frequently recalled articles was noted than for the less frequently recalled articles. It is suggested that the effects of time upon recall of meaningful material may be related to the degree of initial interest of respondents in the material and the implications of this are discussed. Tables are included.

4631
Greenberg, Allan, and Garfinkle, Norton. "Visual Material and Recall of Magazine Articles," Journal of Advertising Research, 3 (June, 1963), 30-34.

An analysis of the relationship between the visual content and the levels of readership, learning, and recall of articles was made. Single girls aged 17 to 24 were interviewed to measure recall of articles in two issues each of Life, Look, Saturday Evening Post, and McCall's--one issue published 2 weeks before the interview and the other 4 weeks before. Single men aged 19 to 26 were interviewed on two issues of Look magazine. Readership and retention were measured by unaided recall, recognition and correct answers on content. Results showed that regardless of whether analysis was applied to all respondents and all magazine articles or merely to specified combinations, the greater the amount of space devoted to visual material, the higher the level of readership and of recall and learning among readers.

3016
Gregory, Margaret, and McLaughlin, W. J. "Teaching the Newspaper in Junior High Schools," English Journal, XL (January, 1951), 23-28.

A unit of newspaper study which brought students a greater understanding of journalism and alerted them to the significance of the freedom of the press is described. At the start of the unit students searched through the English Journal and Clearinghouse and reported procedures which they could carry out in their unit of study. Talks were given by people associated with the local newspaper, and children compared a number of other newspapers. Various sections of the paper, the language used in each, and the amount of space given to each were analyzed. A group of students visited the editor of the local paper, asked questions, and reported back to the class. Twenty-five core activities were designed to meet the needs of all individuals in the class. Oral and written English activities helped develop habits of critical reading and a desire to know the truth. Results of tests given before and after the unit are shown in tabular form.

2914
Griffin, Philip F. "Reader Comprehension of News Stories: A Preliminary Study," Journalism Quarterly, XXVI (December, 1949), 389-96.

A longitudinal study to ascertain reader comprehension of news stories was conducted by the Department of Journalism, University of California. The tested material was the product of only one newspaper, The San Francisco Chronicle. A total of 1,128 anecdotal accounts by heterogeneously selected respondents reported their experiences in reading four newspaper stories during the first 3 years of the study. The study was perhaps most successful in establishing evidence in regard to the construction of a newspaper story that would be more effective in communicating with the reader. The study also demonstrated that to some considerable degree some newspaper stories are not understood because they are poor communication and not exclusively because of faults in the audience. One of the principal accomplishments of the study was the development of evidence that professional newspaper executives do not posses sufficient criteria by which to judge the effectiveness of stories in terms of reader comprehension.

4633
Griggs, Harry H. "Newspaper Performance in Recession Coverage," Journalism Quarterly, 40 (Autumn, 1963), 559-64.

By premising a responsibility of newspapers and analyzing their performance in the light of this responsibility, one aspect of economic coverage was examined. Newspaper performance during the declining phase of the 1957-58 recession was analyzed in five general circulation daily newspapers with the largest circulations. The five papers were the New York Daily News, the Chicago Tribune, the Philadelphia Bulletin, the Detroit Free Press, and the St. Louis Post-Dispatch. The criteria used in measuring newspaper coverage of the recession are described. The results suggested that the five newspapers did much to present the recession in its correct perspective, but fell short of their potential. Recommendations for improving newspaper coverage of economic conditions are given. Tables and references are included.

4238
Groff, Patrick. "Prediction of the Reading Difficulty of Children's Magazines," California Journal of Educational Research, 13 (January, 1962), 39-45.

A prediction of the readability of 14 noncomic magazines for children is presented. The guides used in the selection of magazines were 101 Magazines for Schools, a recognized book collection, and two formulas for readability, the Dale-Chall and the Spache formulas. Only articles and stories in two recent issues, 6 months apart, of the selected magazines were measured. Two tables are included which indicate grade levels, range, and average readability for each magazine studied. The judgments of all the editors of the selected magazines are reviewed and specific conclusions are drawn. Lists of magazines used and references related to the study are included.

4239
Hachten, William A. "The Changing U. S. Sunday Newspaper," *Journalism Quarterly*, 38 (Summer, 1961), 281-88.

A content analysis of 13 selected metropolitan Sunday papers to determine the changes in form and content from 1939 to 1959 is described. Three Sunday issues of each paper were analyzed for the years 1939, 1944, 1949, 1954, and 1959. The following papers were selected on the basis of circulation, geographic location, reputation, and format: Baltimore *Sunday Sun*, Chicago *Tribune*, Denver *Post*, Detroit *News*, Los Angeles *Times*, Louisville *Courier-Journal*, Milwaukee *Sentinel*, Minneapolis *Sunday Tribune*, New York *Times*, Portland *Oregonian*, and St. Louis *Post Dispatch*. An analysis of number of standard size and tabloid pages, number and kinds of sections, allocation of space, and use of supplements was made for the 20-year period. The most outstanding changes were noted in the increase in size, number of magazine supplements, feature coverage (garden, television, travel, homes), and syndicated materials and a decrease in reporting of straight news and coverage of the serious arts. Tables and references are included.

3952
Halfter, Irma T. and Douglass, Frances M. "Measurement of College Level Reading Competence in a Content Area," *Journal of Educational Research*, LIII (February, 1960), 223-30.

The procedures used to construct and evaluate a reading tests which would measure a student's general competence in reading skills peculiar to the field of commerce and which would predict success in a collegiate school of bussiness are explained. Background research, undertaken to determine the appropriate nature of test items, indicated that a competent reader of the literature of commerce was an analytical, essential reader. The resultant instrument, *The Commerce Reading Comprehension Test*, has four sections dealing with vocabulary, sentence meaning, paragraph comprehension, and skill in the interpretation of graphically presented material. The test was evaluated for predicting success in the College of Commerce and Industry at the University of Wyoming. At Wyoming, the combination of the *Ohio State University Psychological Test*, high school grades, and *The Commerce Reading Comprehension Test* provided a multiple correlation of .77 with first semester grades. The College of Commerce of De Paul University conducted studies in standardization, reliability, and validity with students at all academic levels. Correlations were also found with other tests used in schools of business, namely the *Cooperative School and College Ability Tests* and the *American Institute of Accountants' Orientation Test*. The results were sufficiently encouraging to continue to hold to the theses that emphasis on certain kinds of reading skills in a collegiate school of business exists and that these skills seem to involve more than what is generally regarded as comprehension in reading. Further research is suggested. Tables are included.

3019
Harwood, F. W. "Evaluation of Vocabulary of Reading Material," Tasmanian Education, V (December, 1950), 368-83.

The extent to which The Tasmanian Reader, Grade II was likely to increase the child's vocabulary with reference both to new words and to further uses of words already known was explored. The adding of endings was the easiest method of enlarging his mastery of the language. These were listed as Z words. Words syntactically simple but having more complex meanings were called Y words. A third class, X words, consisted of pronouns, particles, and auxiliaries. These had to be studied in sentences. A separate slip was made for every form, and the number of times it occurred was recorded by strokes. The form list was compared with various lists--Hardie's Lists I-VI, Thorndike's AA and A, and Rinsland's Grade I and Grade II lists. Less than half of Hardie's vocabulary occurred in the Reader and a third of the Reader's vocabulary consisted of words outside the Hardie List. The characteristics of the words used from the lists must be considered when assessing a reader. Five tables are included.

5146
Haskins, J. B. "Headline-and-Lead Scanning vs. Whole-Item Reading in Newspaper Content Analysis," Journalism Quarterly, 43 (1966), 333-35.

An investigation was made to determine if the headline-and-lead provided an accurate reflection of a newspaper item's major subject-matter or if it was necessary to read the whole newspaper item in order to classify it accurately. Twelve different newspapers, 121 issues in all, were used as the sample. The headline-and-lead scanning method was found to be about 76 percent accurate for identification of foreign affairs news items. For items dealing with the United Nations, the method was found to be 83 percent accurate. Considerable variation was found among newspapers in the accuracy of the headline-and-lead scanning method which ranged from 64 percent to 84 percent for the 12 newspapers. References and tables are included.

3953
Haskins, J. B. "Pre-Testing Editorial Items and Ideas for Reader Interest," Journalism Quarterly, XXXVII (Spring, 1960), 224-30.

A tool for pre-testing editorial items and ideas was devised for use with national magazines. The method, termed title-rating, expresses in numerical form degrees of interest on a thermometer-type scale, ranging from zero (extremely sure not to read) to 100 (extremely sure to read). Small-sample and nation-wide field experimentation was conducted for validating the technique. A verbal scale and the thermometer scale were compared with the following results: (1) the verbal title-rating scale was not a good predictor of readership; (2) the numerical thermometer scale was a good predictor of absolute item readership, with predicted rank order of item readership correlating highly with actual readership rankings; (3) title-ratings provided better predictions of "Read All" than for "Saw" or "Read Part;" and (4) the interest pre-test did not condition subsequent behavior. Significant and positive reliability was found on subsequent small-sample tests. The technique is equally valid in testing editorial ideas made up of title-and-subtitle forms.

3737
Himmler, Merwin L. "An Analysis and Evaluation of a Television Demonstration of the Teaching of Fifth-Grade Reading, Arithmetic, and French," Pittsburgh Schools, XXXI (March-June, 1957), 129-186.

A television demonstration of the day-to-day teaching of fifth-grade reading, arithmetic, and French in 16 Pittsburgh city and area schools was analyzed and evaluated. Comparisons were made between 20 television classes (experimental) and 19 non-television classes (control) for reading and arithmetic. Identical textbooks, courses of study, dictionaries, workbooks, and time allotments were used for the experimental and control classes. Data were gathered from intelligence tests given at the beginning of the term and from standardized achievement tests administered at the beginning and end of the term. Separate matched groups in reading and in arithmetic were drawn up on the basis of these scores. A teacher-made French test was administered over television at the end of the term. Five questionnaires were designed and administered throughout the term to obtain observations and reactions from teachers, pupils, parents, and principals. Analysis was made of questionnaire responses and of pre- and post-test data for the matched groups. Details concerning teaching materials, time arrangements, selection of teachers, organization of TV teaching, and teaching methods are given. It was concluded that there may be little observable difference between the instructional effectiveness of TV teaching and regular classroom teaching, although the control group had significantly higher grade equivalent scores in reading and arithmetic. A detailed discussion of the findings and their implications is given. Tables and a bibliography are included.

4423
Johnson, Lois V. "Children's Newspaper Reading," Elementary English, 40 (April, 1963), 428-32, 444.

A study to explore some aspects of the newspaper reading habits and interests of children in grades 4, 5, and 6 in three public schools in an urban area is reported. A questionnaire was given to 564 children with a normal range of reading achievement. The funnies or comics were reported as "usually read" and "liked best." The news or front page news was indicated as next in interest. Sports news rated third. A discussion of reasons why children reported differences is given. The majority of children named one or more school subjects in which they had been helped by newspaper reading. The reported effect of newspaper reading on school subjects is discussed.

3520
Jones, Harold. "Readability and the Results of Applying a Readability Formula to Health Textbooks," _A Report of the Tenth Annual Conference on Reading_, University of Pittsburgh, July 12-July 23, 1954, 56-66. Pittsburgh, Pa.: University of Pittsburgh Press.

An extensive discussion of readability and readability measurement and its importance, together with an assessment of the readability of books for grades 4 through 8 of several series of health textbooks is provided. The Yoakam Readability Formula was used to determine the level of difficulty of sample selections from 32 books. The material in these books was found to be highly variable from page to page and from chapter to chapter. Only one series consistently placed books within the proper grade-level range. The greatest variation was found in seventh-grade texts where the easiest book was rated 7.1 and the most difficult 9.6. An analysis of the words used in these books, indexed according to the Thorndike list, is provided.

3009
Journalism Quarterly. "Factors in the Reading of Weekly Newspapers," XXVIII (Winter, 1951), 88-92.

Some research in the communication fields is reported briefly. The State University of Iowa in cooperation with the Iowa Press Association made a readership survey of the _Lauren Sun_. The following eight factors in newspaper reading were studied--(1) when the paper was read, (2) retention of the paper in the home, (3) possible readers of the paper, (4) subscription duration, (5) overlapping circulation, (6) what readers especially liked or disliked about the newspaper, (7) depth of readership, and (8) the most enjoyed story on each page. A total of 128 men and 132 women was selected by stratified-random methods from 96.1 percent of the subscribers in the Laurens trade area. The interviewing method was that of unassisted recall. A second survey by Donald W. Davis indicated an increase in the number of colleges offering courses in advertising, marketing, and public relations, since 1946.

4671
Kraus, Sidney, Mehling, Reuben, and El-Assal, Elaine. "Mass Media and the Fallout Controversy," Public Opinion Quarterly, 27 (Summer, 1963), 191-205.

A study to examine the relationship between media presentation of the radioactive fallout controversy and certain characteristics of those exposed to the media are reported. The characteristics were knowledge about nuclear fallout, education, media exposure and anxiety. Three hypotheses were formulated: (1) knowledge about nuclear fallout will increase as educational level increases, (2) knowledge about nuclear fallout will increase as media exposure increases, and (3) anxiety about the effects of nuclear fallout will decrease as knowledge about nuclear fallout increases. A pilot study was completed. Two hundred thirty-six residents of a medium size Middle Western College town were selected by random area sampling. A questionnaire survey procedure was used to collect data. Questionnaires from 94 percent of the originally projected sample of 250 were utilized in the final data analysis. In order to test the three hypotheses, each respondent was assigned three scores based on responses to the questionnaire. No significant relationship was found between media exposure and level of knowledge of radioactivity. A significant relationship was found between educational level and knowledge of radioactivity regardless of absolute degree of media exposure. The amount of anxiety possessed by the respondents was not related to their educational status, media exposure, sex, or presence of children in the home. Anxiety appears to be relatively constant and equally distributed among all levels of the media audience regardless of their knowledge of radioactivity or media exposure. Tables are included.

5188
Kuroda, Y. "Newspaper Reading and Political Behavior in a Japanese Community," Journal of Communication, 15 (1965), 171-81.

This survey is based upon data gathered in 1963 in a community survey and relates to the question of the effect of newspaper reading on the level of political participation and political orientation of the registered voter in a specific Japanese community. The subjects were 278 systematically selected registered voters in a community of 16,500 near Tokyo. Two major factors which affect newspaper reading are considered especially potent: those factors which are culturally defined, and those pertaining to occupation and political involvement, especially as concerns the critical attitudes toward the existing regime. Nine variables were isolated and treated separately and statistically to establish their influence upon newspaper reading. Some interpretation of findings and suggestions for further investigations are suggested as a result of the survey. References are listed.

5191
Lee, Wayne D., and Belden, Bernard A. "A Cross-Validation Readability Study of General Psychology Textbook Material and the Dale-Chall Readability Formula," Journal of Educational Research, 59 (April, 1966), 369-73.

The validity of the Dale-Chall Readability Formula when used to measure general psychology textbook materials was tested at Okalhoma State University. The null hypothesis was that no significant difference exists between the coefficient of correlation obtained in the original cross-validation obtained by correlating the readability index of a comprehension test with reading-grade level of certain students enrolled in general psychology at Oklahoma State University who were able to answer three questions out of four on the test of comprehension. An author-constructed test designed to measure reading comprehension was developed from representative material of a general psychology textbook. The methods for test development and establishing a coefficient of reliability are described. Results from the author's Completed Test of Comprehension of General Psychology textbook materials were tabulated, coded, and punched into IBM cards along with the reading grade score for each subtest of the Nelson-Denny Reading Test, 1960 Revision. When the null hypothesis was tested, a critical ratio score well below that required for .05 level of significance was obtained. The null hypothesis was accepted. Without further research, it was felt that one could not place too high a level of confidence in the use of the Dale-Chall Readability Formula as a grade-level predictor when evaluating general psychology textbook material. Tables and references are given.

5546
Lee, Wayne D. "Readability of General Psychology Textbook Material: A Cross-Validation Study of the Dale-Chall Readability Formula," Ed.D., Oklahoma State University, 1963. Adviser: W. Ware Marsden, XXV, No. 2, 939. (Order No. 64-8930, Microfilm $2.75; Xerography $5.60, 112 pages).

The validity of the Dale-Chall Readability Formula was investigated. The methodology consisted of a cross-validation of the readability index of 12 selected passages from a general psychology text with the reading-grade level of the grade-equivalent groups in which 75 percent of each group were able to answer three or four questions correctly on that passage. The Nelson-Denny Reading Test, 1960 Revision, was used to measure the reading level of the 396 subjects involved. From an analysis of the findings, the author concluded that the Dale-Chall Readability Formula may be a valid predictor of comprehension difficulty of general psychology textbook material.

4268
Lyle, Jack. "Immediate vs. Delayed Reward Use of Newspapers by Adolescents," Journalism Quarterly, 39 (Winter, 1962), 83-85.

The effectiveness of immediate reward use and of delayed reward use of newspapers by adolescents was studied. An attempt was made to distinguish general typologies of adolescent newspaper readers. Data were gathered by self-administered questionnaires from 674 sixth graders and 700 tenth graders present on the test day in five Rocky Mountain towns. The checklist consisted of 10 categories of newspaper content. Four were grouped as hard news--local, national government, international and editorials. Five were grouped as entertainment content--columns, society, sports, radio-TV log, comics. Advertising was the tenth category but was not treated in this analysis. Dependent variables included teacher's ratings of the child in top, middle or low third of class according to mental ability, social use of news, exposure to various mass media, perceived conflict between own and parental aspirations for self, educational aspirations, and socioeconomic status based on father's occupation. Rough typologies did exist in both grades, and distribution changed with age. In the tenth grade, the expected positive relationship between selection of newspaper content and media use in general was present. There was a significant relationship between selection of content and frequency of newspaper reading. Other results are given and discussed. Tables are included.

3336
Malsbary, Dean R. "A Study of the Terms that People Need to Understand in Order to Comprehend and Interpret the Business and Economic News Available Through the Mass Media," Studies in Education. (Thesis Abstract Series), No. 4, 199-204. Bloomington: School of Education, Indiana University, 1953.

A three-phase study to identify the terms people should understand in order to comprehend and interpret business and economic news available through the mass media is reported. Sources of business and economic news used by parents of senior high school students in Bloomington, Indiana, were determined by a questionnaire. The parents who completed and returned 144 questionnaires obtained news regularly from 263 sources. These parents relied on newspapers more than on periodicals, and they read business and economic news relating to government and consumers more than other news of a business or economic nature. An alphabetical frequency list of business and economic terms was derived from 112 issues of newspapers, periodicals, and newscasts. Student understanding of 100 selected business and economic terms was measured by a multiple-choice test which was administered to 222 high school seniors. Measures of central tendency and percentage were used to analyze the data. Eleven terms were understood by 90 percent of the students. Seventy-nine terms were understood by 50 percent of the students. There was some relationship between the frequency of term occurrence and student understanding. Conclusions and recommendations are presented briefly.

3641
Mardh-Andersson, Aina. "Presentation of New Words: An Experiment in Foreign Language Teaching," Research Bulletins from the Institute of Education, University of Stockholm, No. 10, December, 1956. Stockholm Va. Sweden: Institute of Education, 8 Observatoriegatan.

Three different ways of presentation were studied to determine which yields the most effective learning and retention of isolated words in English as a foreing language. The principal subjects, members of three parallel beginner groups totaling 25 adults in the University Study-Course Organization, were compared with 57 pupils from three elementary school fifth-year classes. The author served as teacher and tester for the adult evening classes, while the home room teachers instructed the children who were tested by the author. Subjects were presented 45 real-life words divided into three groups according to: an English word read and the corresponding Swedish word given, an English word read and the corresponding picture shown, and an English word read and the corresponding object shown. Presentation and tests were rotated, and after a 6-week interval, all 45 words were tested. Retention was tested through matching, including distractors. Scoring was based on correct markings. Data were treated statistically for individual tendencies as to retention of different stimuli and to ascertain if deviations between retentions were accidental or significant. Subjects were classified as positive, negative, or zero in relation to response to the stimulus. In discussion, the author stated that the exploratory study warranted continued use of visual aids for adults as well as for children. A more penetrating, analytical statistic treatment is advised. Tables of results are included.

4282
McNelly, John T. "Meaning Intensity and Interest in Foreign News Topics," Journalism Quarterly, 39 (Spring, 1962), 161-68.

A study designed to investigate possible media message effects on audience interests, specifically in the field of foreign news, is described. The theoretical formulation centered around the development of meaning for "assigns" or verbal signs through associational processes as described by Osgood. An important part of the study was the development of a meaning intensity index which was composed of polarization on evaluative scales of the semantic differential, in addition to absolute scores on potency and activity scales. Use of this index made it possible to relate the acquisition of interest to assign development. In two experiments, one with high school groups and the other with university groups, subjects were exposed to news stories about foreign topics of low previous familiarity. Results, in general, were as hypothesized. Exposure to news stories about the topics resulted in increased meaning intensity for them. Increases in meaning intensity were accompanied by increases in expressed interest and in the probability of further readership about the topics. These results suggest the practical use of a meaning intensity index in predicting attention to media messages. Three tables and references are included.

4452
Miller, Wilbur R. "Readability Versus Reading Ability," Journal of Educational Research, 56 (December, 1962), 205-09.

Research studies using readability formulas to assess the reading difficulty of school textbooks and references are summarized. An investigation to find the degree of compatibility between the readability of general shop textbooks in industrial arts and the reading abilities of ninth-grade industrial arts students was undertaken. The criterion for the selection of textbooks is described. The Dale-Chall and Flesch formulas were used to find the rated readability of general shop textbooks. Students from a 23-county area of central Missouri were tested with the silent reading comprehension section of the Iowa Tests of Basic Skills and the Lorge-Thorndike Test of Intelligence to determine their reading ability. A wide range of readability levels, from seven to eleven grade levels in any one book, was found for the textbooks studied. A mean grade level of 8.3 was found for the students. Some sections of general shop textbooks were too difficult for ninth-grade students to read. The implications of this for publishers and teachers are discussed. References and tables are included.

3651
Nixon, Raymond B., and Jones, Robert L. "The Content of Non-Competitive vs. Competitive Newspapers," Journalism Quarterly, XXXIII (Summer, 1956), 299-314.

The hypothesis that there are no significant differences in daily newspaper content which appear to be related to the presence or absence of local newspaper competition in cities of less than 400,000 population, so far as major categories of news, editorial and feature matter are concerned, was tested. A list of competitive and non-competitive combination papers in cities of the population groups from 10,000 to 400,000 was prepared, and competitive and non-competitive dailies were matched. A content analysis was made for 13 pairs of such matched papers. Additional data from the International Press Institute's study of the flow of foreign news into 93 dailies in the United States, from The Continuing Study of Newspaper Reading, and from the Quantitative Analysis of the Content of

Morning, Evening, and Sunday Newspapers, published by Media Records, were used. No significant differences in space allocation between competitive and noncompetitive dailies for the 17 categories analyzed were found. It was noted that competitive papers had slightly larger news holes (non-advertising content) and ran slightly more editorials on local subjects, but neither difference was statistically significant. References and tables are included.

4301
Pace Zietta S. "Flesch Formulas Applied to Current Readings," *Psychological Record*, 11 (April, 1961), 133-137.

The Flesch formulas for assessing readability and human interest of writing were applied to 25 articles from five collections of readings in psychology by Beardslee, et al., Daniel, Dulaney, Hartley and Hartley, and McGuigan. The results of this study were compared to those of Anderson's 1956 study. Three 100-word passages were taken from each article. A readability score and a human interest score were computed for each article, and from these were derived the mean and standard deviation for each text. The human interest and readability scores within each text were correlated to show the relationship between the two. The range within each text was determined. The articles differed widely: some were readable but lacked human interest, others lacked both, a few were both readable and rich in human interest. While improvements have been made in these psychology readings assigned to beginning college students, the improvements have been neither uniform nor impressive. References and tables are given.

3041
Pashalian, Siroon and Crissy, William J. E. "How Readable Are Corporate Annual Reports?" *Journal of Applied Psychology*, XXXIV (August, 1950), 244-48.

The problem of writing annual corporate reports so that they present a readable as well as an informative account of the year's operations was studied. A sampling technique suggested by Flesch was applied to 100-word samples chosen from every other page of each of 26 annual reports. A total of 211 samples from reports of corporations listed in the Corporate Billion-Dollar Club were examined. Reading ease scores and human interest value scores revealed that, on the whole, the general reading level of the reports was difficult and the human interest value dull. The reports contained language beyond the language experience and fluent comprehension of approximately 75 percent of the adult American population.

5606
Pelletier, Harold W. "An Investigation of the Relation Between Training in Instrumental Music and Selected Aspects of Language Growth in Third Grade Children," Ed.D., Arizona State University, 1963. Chairman: Maurice S. Lewis, Vol. XXV, No. 11, 6440. (Order No. 64-2192, Microfilm $2.75; Xerography $8.40, 181 pages.)

The relationship between training in instrumental music and selected aspects of language growth in third-grade children was investigated. Specifically, the investigator compared the reading and spelling achievement of music students and non-music students. Aspects of language growth were also correlated with an auditory discrimination test. The population consisted of 110 third-grade children divided into equivalent experimental and control groups. "Groups were equated on the basis of reading and spelling achievement, but no significant differences appeared between groups in IQ or auditory discrimination." The experimental group was subjected to a 25-week course of instruction on the experimental instrument. In the findings, the author states that no significant differences in reading vocabulary or spelling gain were found between groups. The mean gain in reading comprehension was 1.9 months greater for the experimental group, a difference significant at the .10 level. Highly significant correlations were found between aspects of language growth and the rhythm-tempo and pitch subscores of the Conn Music Aptitude Test (Auditory Discrimination).

3044
Raney, Edward T., "How Readable Is Your Employee Publication?" Personnel Psychology, II (Winter, 1949), 437-59.

This survey sought to set standards for publications. The first standard was a content analysis which enabled an editor to find what percent of column space he was giving to various topics of his publication. A list of broad categories of articles found in company papers was drawn up, and a worksheet for content analysis was printed, listing major topics, subthemes, and dates. Column space in inches was counted and totaled, and percent of column space was calculated for each topic. A second standard, one of readability, showed that according to Flesch's Readability Ease Formula, 65 percent of the samples were hard or very hard. A quick appraisal suggested that the very things management wanted its employees to know were being pitched at a level far over their heads. A summary of procedures for using content analysis and a reading ease formula are included with tables and references.

4133
Rowland, Howard R, and Hileman, Donald G. "The Inter-City Daily in the United States," Journalism Quarterly, XXXVII (Summer, 1960), 373-80.

The intercity daily is discussed as a form of newspaper consolidation and expansion in which a nonmetropolitan daily becomes the dominant paper in a two or more closely associated municipalities. The phenomenon in the United States, where at least 68 intercity dailies are being published, is described. A comparison with the French regional newspaper is made. One notably successful intercity daily, the Southern Illinoisan, is examined in detail. The following factors were isolated as the important ones in the newspaper's successful development: (1) proximity of the municipalities, (2) similarity in community size, (3) presence of chain stores, (4) cultural and economic ties, (5) mutual problems and needs, (6) agencies emphasizing area development. Tables and references are included.

5273
Schaefer, W. "Scale Measures of Magazine Reading," Journal of Advertising Research, 5 (1965), 21-26.

A study of readership accumulation carried out for the German magazine Der Stern is described. Two methods were employed. The first was patterned after the 1962 Look study by Audits and Surveys in which empirically found data on the reading of four issues were projected to 13 issues by a "Latent Behavior Function." The second one, Frankel's scale, was extended to 13 points to conform to the usual accumulation curves from one to 13 issues. Interviewing was done in two waves of 1,000 cases each. Reading of the four issues was ascertained by presenting skeletonized issues of the magazines studied and by asking respondents to look through them and indicate whether they had read or glanced through one or more of them. The "Latent Behavior Function" is based on the numerous accumulation studies conducted in the United Stated and attempts to set up a basic curve of reading probability which would allow the projection of empirically found reading habits. Through use of this 13-point scale, the average and cumulative audiences of eight German magazines were accurately approximated. References, figures, and tables are given.

3149
Schramm, Wilbur and Ludwig, Merritt. "The Weekly Newspaper and Its Readers," Journalism Quarterly, XXVIII (Summer, 1951), 301-14.

The relationship of a weekly newspaper to its readers is quantified as a basis for some general statements about the place of a weekly in a community and a communications system. From the published surveys during the last 12 years, 24 were selected on the basis of specified criteria. The surveys were categorized and recombined from a number of viewpoints including reading time, reading by the size of the paper, reading by the size of the community, page one readership, competition for reading time, and sex differences in reading. Conclusions and references are included.

4494
Scott, Carrie M. "The Relationships Between Intelligence Quotients and Gain in Reading Achievement with Arithmetic Reasoning, Social Studies, and Science," Journal of Educational Research, 56 (February, 1963), 322-26.

The relationship between IQ and achievement in various subject areas was studied. Increased reading ability was examined to detect gains in other areas of achievement. Three groups totaling 670 pupils for whom IQ data and the results of the Stanford Achievement Test were available were selected for the study. Grade scores were arranged to compare with national norms. The Pearson-Product-Moment Formula correlation was used between the intelligence and achievement scores. The findings indicated variations in the amount of gain as measured by the achievement tests, inconsistencies in gains on subtests, achievement test scores above national norms, highest correlations of IQ with arithmetic and lowest correlation with science, highest correlation of gain in reading with gain in social studies and lowest with gain in science, and positive correlation between reading gain and gains in other content areas. Tables and references are given.

3448
Sennett, T. B. "The Interpretive Story as an Aid to Understanding News," Journalism Quarterly, XXXI (Summer, 1954), 365-66.

Interpretive reporting was studied to see if it had greater learning potential than the straight news story. Fifty-two juniors in journalism at the University of Illinois were exposed to two fictitious newspaper stories. Each story was written both as a news story and as an interpretive report. After exposure, subjects were tested on two types of questions: (1) items testing recall of factual statements and (2) items requiring the subjects to indicate associations between events or to generalize from the facts stated in the stories. It was indicated by the data that students reading the interpretive stories answered approximately twice as many interpretation test items correctly as those reading the news story. However, the hypothesis that interpretive reporting is more conducive to retention of facts was not proved.

4747
Shepherd, John R. "Newspaper Publicity and Educational Television Viewing," Journalism Quarterly, 41 (Winter, 1964), 103-05.

A study to evaluate the effectiveness of the newspaper publicity of an educational television program is reported. After receiving relatively wide press coverage in two major newspapers of the Eugene, Oregon area, the 13-part NET series "Ragtime Era" was broadcast simultaneously by KOAC-TV and by KOAP-TV for 12 weeks starting February 13, 1961, and 9 to 9:30 P.M. Senior and graduate students from Speech 445, Radio-Television Production, at the University of Oregon made a telephone survey of television viewing in 326 homes during the fifth week of the study. It was found that less than one percent of the respondents were viewing the program in question. A table is included.

5286
Simmons, W. R. and Associates Research, Inc. Profile of the Millions. (4th ed.) New York: Advertising Research Foundation, Inc., 1964.

A study of the New York market and adult readers of six daily and five Sunday newspapers and adult viewers of evening television was sponsored by the New York News and was conducted by W. R. Simmons and Associates Research, Inc., New York. The results of this survey are presented. The New York newspapers surveyed included the News, Herald Tribune, Times, Journal-American, World-Telegram & Sun, and the Post. A total of 5,517 interviews was conducted during May, 1964, with adults 15 years of age or older in separate households in 401 sample areas throughout New York City and Retail Trading Zones as defined by the Audit Bureau of Circulations. The newspaper reading and television viewing characteristics of the population are illustrated by bar graphs. Variables including sex, city and suburbs, age size of household, position in household, type of dwelling unit, owned and rented homes, education, occupation, and family income were considered. An appendix describing the planning and execution of the survey and presenting samples of the questionnaire as well as technical data is included.

3052
Spaulding, Seth. "Two Formulas for Estimating the Reading Difficulty of Spanish," Educational Research Bulletin, XXX (May 16, 1951), 117-24.

Efforts were made to establish two formulas for rating Spanish materials according to reading difficulty. A group of judges estimated the difficulty of 20 selections from Spanish passages on Ph.D. language examinations. Average word length, average sentence length, frequency index, corrected frequency index, and denisty of the passages were the variables used. The elements which showed highest correlations with the criterion were then weighted and combined into a formula which estimated the difficulty of passages other than those used in establishing the criterion. The interrelations of certain variables were computed. Rank-difference correlations were made between the criterion and the five variables and also between the variables themselves. Two formulas, one using the corrected frequency index and the other the density, were established. The former was more accurate, but the latter was easier to compute. It was suggested that as schools used the formulas, norms could be established, and the formulas could be made more accurate. Statistical tables and the formulas are included.

3672
Spaulding, Seth. "A Spanish Readability Formula," Modern Language Journal, XL (December, 1956), 433-41.

The Formula de "Lecturabilidad" is explained as being a simple measure of vocabulary and sentence structure for accurate prediction of the relative difficulty of Spanish prose writing. Two factors were found to have a high correlation with reading difficulty and low correlation with each other, thus measuring different aspects of reading difficulty. The two factors were combined into a multiple regression equation which measures relative difficulty in Spanish with a reliability of .87. Word usage is measured by a "Density" calculation, and sentence complexity by "Average Sentence Length," both of which yield vocabulary difficulty. Use of the formula consists of the choice of passages of approximately 500 words, to be analyzed completely, or of random samples of 100 words each, for a count of the number of words and the number of sentences for arrival at the "Average Sentence Length." "Density" is arrived at by counting the number of words that do not appear on the Density Word List. Definite rules for this computation are set forth for the user of the scale. References are given. The Density Word List is appended.

5301
Stempel, G. H. III, and Kliesch, R. E. "Which Readers Are Reached If Paper Expands Coverage?" Journalism Quarterly, 43 (1966), 335-36.

The effect of an increase in news content on newspaper readership was studied. The campus paper at Ohio University at Athens began using wire copy which increased the national and international news coverage. A survey of media use and campus newspaper readership by undergraduate students was undertaken. Interviews were completed with 80 percent of a 287-subject random sample. A sample of survey items is included. Twenty-one percent of the students had no media exposure. Thirty-five percent had exposure to one media, and 44 percent had exposure to two or more media. People who had no media exposure continued to avoid exposure to national and international news when they read the campus paper. Explanations of the results and references are included.

4329
Stempel, Guido H., III. "Content Patterns of Small and Metropolitan Dailies," Journalism Quarterly, 39 (Winter, 1962), 88-90.

A study was made of eight Michigan dailies, the four largest and the four smallest, to determine if a more conservative pattern and a bigger proportion of hard news would be present in the small daily. Deutschmann's basic categories were used: (1) war and defense, (2) economic activity, (3) crime, (4) public moral problems, (5) public health and welfare, (6) accident and disaster, (7) science and invention, (8) education and classic arts, (9) popular amusements, and (10) human interest. Relative agreement was found among the papers as to the important categories, but considerable disagreement as to the importance of certain categories. Rank correlations were obtained by ranking each category for each newspaper according to the space in that category and correlating those ranks. It was found that neither the small dailies nor the big dailies were all alike. A tendency was noted for the small town daily to place a little more emphasis on hard news. Tables and references are included.

2962
Stern, Bernard. "How Local Governmental News Is Handled by Three Dailies," Journalism Quarterly, XXVII (Spring, 1950), 149-56.

A space count, an item or subject analysis, and a word or readability study were made for three Iowa newspapers. Each paper had a circulation of 20,000 or more. Two had Independent Republican editorial viewpoints, and the third had an independent viewpoint. Each city had a population of approximately 25,000, was a county seat, an industrial and agricultural center, and the site of a junior college. Analysis of material was classified under (1) news stories, (2) editorials, and (3) state and county government news, including political news and activity. The study provided the editor with a starting point for interesting his readers in specific problems. References are given.

3055
Stern, Bernard, "An Analysis of Readership of the Daily Newspaper 'Split' Page," Journalism Quarterly, XXVIII (Spring, 1951), 225-28, 274.

An analysis of the readership of the second front or split page (the front page of the second section) of 41 small, medium, and large daily newspapers is reported. A paper was considered small if circulation did not exceed 40,000, medium if circulation fell between 40,000 and 100,000, and large if circulation was in excess of 100,000. The study attempted to find out how the second front page compared in readership with the front page and what factors tended to increase readership of the split page. The following observations were made--(1) Use of local or syndicated columnists apparently attracted reader traffic, (2) predominate use of ads on the split page resulted in a lower readership for that page than if other types of content were featured, and (3) regardless of their location, pages with a preponderance of local news were second in popularity in 22 cases, while in three other instances were most popular or tied for first place.

5003
Stevens, John D. Readability in 20 Technical Journals. Circular 10, Washington State Institute of Technology. Pullman: Technical Extension Service, Washington State University, 1964. Pp. 6.

The Gunning readability formula is used to determine the difficulty level of 60 articles appearing in 20 scientific and technical journals. The median score for the 20 journals was 14.21, the college sophomore level, which was considered appropriate for technical publications. Scientific writers tend to defend a high Gunning score by saying that it is due to the necessary use of polysyllabic words. Actually, about 85 percent of the articles reviewed scored higher on sentence length than on polysyllable count. This discussion of the problems of technical writing is concluded with the suggestion that a readability formula be used by scientific authors. References are given.

4760
Stevenson, Robert L. "Readability of Conservative and Sensational Papers Since 1872," Journalism Quarterly, 41 (Spring, 1964), 201-06.

Changes in the readability of conservative or stable newspapers since 1872 are compared with the changes in the readability of sensational newspapers for the same time span. Chosen to represent the stable group were the New York Times, the New York Tribune and the Washington Post. Newspapers considered responsive to sensationalism were the New York World, the Chicago Tribune and the San Francisco Chronicle. Readability tests based on the revised Flesch formula were run on 200-word samples of the lead stories taken from these six dailies for the years 1872, 1895, 1925 and 1960. Means were computed for the stories in each newspaper and an additional mean was computed for the entire category at each date. T-tests of the significance of the difference between the two means were run. This study lends support to the assumption that readability is closely related to sensationalism. The six United States dailies examined in this study are not much easier to read than they were in 1872. The readability of "responsive" or sensational papers actually has declined since the days of yellow journalism, while the stable papers have improved their readability scores. References are included.

5005
Stewart, Janice S. "Content and Readership of Teen Magazines," Journalism Quarterly, 41 (Autumn, 1964), 580-83.

The influence of magazine content directed to teenagers was studied. It was noted that the majority of the magazines emphasized entertainment heroes and invited questions on teenage problems. The third largest group of articles was concerned with fashion and beauty. Contest and pen pal departments were frequent. It was concluded that the teen magazines, with two exceptions, were not harmful in their influence. A questionnaire to determine the appeal of articles and magazines was given to 332 students who were divided into three groups of low, middle and high ability in grades 7 through 12 at West Junior-Senior High School, Madison, Wisconsin. The school enrolled students of better than average ability from better than average income families. It was found that the teen magazines as a group appealed less to the students than did adult magazines.

3570
Swanson, Charles E. "What They Read in 130 Daily Newspapers," Journalism Quarterly, XXXII (Fall, 1955), 411-21.

The importance of visual appeal to readership of news and editorial feature content in 130 United States dailies was studied. Data were based on personal interviews totaling about 50,000 for the 130 newspapers from 1939 to 1950. Newspapers varied in character, and circulation ranged from 8,570 to 635,346. Every geographical region of the country was represented. Newspaper content was classified into 7 categories. Analysis was based upon the midpoint and range of percentages of readership, and a more exact profile was derived from grouping responses into quartiles. A median of 12 percent readership led to the assumption that ability of personnel and creative brainpower would be most important in relation to successful competition. Subject-matter ran second in importance. Five concrete suggestions are offered to the newspaper editor. Implications for further investigation of relationships between the estimated and observed readership are discussed.

3571
Swarts, Mary G. "The Readability of Books Written for Teachers about Reading," A Report of the Tenth Annual Conference on Reading, University of Pittsburgh, July 12-July 23, 1954, pp. 38-48. Pittsburgh, Pa.: University of Pittsburgh Press.

The readability level of 23 textbooks published between 1941 and 1951 dealing with the teaching of reading was measured. Yoakam's, Dale-Chall's, and Flesch's readability formulas were applied to original, proportional, and equalizational samplings from each book. Yoakam's grade scores were higher on the average than Dale-Chall's, but lower than Flesch's. The three formulas differed considerably in the predicted difficulty of the reading contents, but were fairly consistent in indicating which books would fall into (a) difficult, (b) average, and (c) easy classifications. No consistent evidence indicated the superiority of one type of sampling over another. Generally, the formulas did not rank a difficult book easy or vice versa. Apparently, the general rather than the technical vocabulary used seemed to be the major cause for a high readability level. Implications are listed. Tables are included.

3462
Toops, Myrtle Dewey. "The Core Program Does Improve Reading Proficiency," Educational Administration and Supervision, XL (December, 1954), 494-503.

A study of reading achievement in vocabulary and comprehension was conducted in two adolescent-needs core classes of 30 children each over a period of 2 years in Burris Laboratory School of Ball State Teachers College in Munice, Indiana. The 60 children, 11 to

13 years of age during the 2 years of the study, spent 2½ hours each day in the core class and were taught for 2 consecutive years by the same core teacher. They were matched as evenly as possible according to intelligence and had no visual or auditory problems. The program was planned cooperatively by the teacher and students, and the problems approach was followed. Reading was not taught as a special subject at any time, except in a few extreme individual cases. Materials of many levels of reading achievement were used, and a recreational reading program was part of the planned program. The children showed mean gains of more than 2 years in grade level achievement in both comprehension and vocabulary and in total reading in the 2-year period spent in the core program. Complete results and research data are provided. Tables and references are given.

3161
Trenchard, Kendal I., and Crissy, W. J. E. "Readability of Advertising and Editorial Copy in Time and Newsweek," Journal of Applied Psychology, XXXVI (June, 1952), 161-63.

The readability of prewar and postwar advertising and editorial copy in Time magazine and Newsweek, as determined by the Flesch formulas for Reading Ease and Human Interest, was investigated. Ten pages of copy randomly selected from each of 10 issues of Time and Newsweek which were randomly chosen for each year during the periods from 1936-1940 and 1945-1949 were analyzed. The following trends were noted in a comparison of the prewar and postwar periods--(1) advertising copy was becoming more difficult (significant in Time), (2) editorial copy was becoming easier to read (significant in Newsweek), (3) advertising copy was easier to read than editorial copy in both magazines, and (4) advertising and editorial copy in Time was significantly more interesting than Newsweek. Tables and references are given.

5022
Troldahl, Verling, C., and Jones, Robert L. "Predictors of Newspaper Advertisement Readership," Journal of Advertising Research, 5 (March, 1965), 23-27.

The proportion of total variability in reading newspaper advertisements that could be explained by size of advertisement, type of product advertised, copy-picture ratio, and number of items in the advertisement was determined. Data from nine readership surveys of the Minneapolis Morning Tribune conducted annually from 1948 through 1957 (except 1955) were used. Male scores were based on 83 personal interviews, and female scores on 91 interviews. Male and female scores were analyzed separately. Advertisements were classified and rated on the four predictor attributes listed above. Intercorrelations among the advertisement elements were made to see if the four predictor variables correlated. Partial correlation coefficients were computed. For both men and women, about 40 percent of the variability in readership was not explainable by the four factors studied. The size of the advertisement and product advertised explained about three-fifths of the variability in readership. References are included.

3162
Twedt, Dik Warren. "A Multiple Factor Analysis of Advertising Readership," Journal of Applied Psychology, XXXVI (June, 1952), 207-15.

A study was conducted to determine what effect readership had upon business advertising. The design employed was intended to uncover general principles of advertising which would increase the probability that prospects would be exposed to a given sales message. Correlations with readership, means, and standard deviation of 34 advertising variables are reported. The study is concerned with readership variance attributable to mechanical and/or content differences in 137 advertisements in one issue of the American Builder. Six factors accounted for the reported intercorrelations. Picture color and size accounted for 53 percent of the variance in readership. Statistical findings are expressed in tabular form. References are included.

3370
Waterman, John T. "Reading Patterns in German and English," German Quarterly, XXVI (November, 1953), 225-27.

A study was conducted to determine whether there was a German reading pattern or whether the process was essentially the same for both German and English. Twenty-five native American students of German were given a series of visual tests to determine the efficiency of their reading in English. All received a least a good rating. All tests were administered with the ophthalmograph, a specially constructed motion-picture camera that records the movements of the corneal reflexes on 35 millimeter film. For the German tests, special sentences were drawn up which included examples of inverted and transposed verb position, modal auxiliaries, separable prefixes in simple and compound tenses, and instances of almost every sort which differ from accepted English word order. The reading of German sentence patterns as recorded on the ophthalmograph differed in no essential features from the English patterns. Several instances of meandering were recorded, but this was always occasioned by vocabulary difficulties. Furthermore, there was no apparent change in reading habits when an educated native speaker of one language learned to read the other.

2974
Watts, Phyllis W. "Language Needs of Vocational Students," California Journal of Secondary Education, XXV (April, 1950), 207-13.

A study to determine the language needs of vocational students was conducted in 16 schools in Fresno County. A questionnaire listing language activities was circulated among vocational and English teachers. Of the 82 questionnaires distributed, 53 were returned. The table included in the study shows the findings of the rating scale used on the questionnaire. The results are listed under (1) the minimum essentials for unskilled workers, (2) the needs of the middle group who will be employed in the skilled trades, in clerical and sales positions, in some semiskilled trades, in some semiprofessions, and who will be the owners of small farms, and (3) the activities associated the leaders--the proprietors and managers and those occupying clerical and sales positions of responsibility. The study did not intend to imply that less should be expected of one group than of another. It pointed out that the emphasis should be in those areas that have meaning in terms of individual life goals and that quantity should be in terms of individual ability rather than in terms of social status.

3163
Wheeler, Lester R., and Wheeler, Viola D. "The Relationship Between Music Reading and Language Reading Abilities," Journal of Educational Research, XLV (February, 1952), 439-50.

The relationship between music reading and language reading abilities was studied in the Sylvania Heights School in Miami, Florida. The Knuth Achievement Test in Music, Division 2, Form A, was given to 243 pupils in fifth and sixth grades. Reading ability was determined by the Progressive Reading Tests, Form A. Average intelligence of the group was 102.46, with a range of 72-135. Data were analyzed according to students who reported private study and students who had no music training outside the school. The relationships between scores in music reading, language reading, and intelligence were correlated for a selected group with music scores of 4 or more. Music reading ability was nearly equal for boys and girls, slightly higher among pupils taking private music lessons, lower than achievement in language, positively correlated with language reading (but low), and less correlated with intelligence than the ability to read. An extensive review of related studies, tables, and a bibliography are included.

4791
Wilcox, Walter. "Numbers and the News: Graph, Table or Text?" Journalism Quarterly, 41 (Winter, 1964), 38-44.

A study of the graphic vehicles to determine whether a commonly available graphic vehicle enhanced the understanding of a news story based primarily on statistics is given. The effectiveness of the three vehicles was examined. Previous research concerned with learning theory and with mass communication is described. Respondents were chosen from adult education groups and adult church groups and were divided into one control and three experimental groups. The bar graph was superior to the table and text. A discussion of the findings and their significance is presented. Tables are used. References are footnoted.

4793
Winick, Charles. "Three Measures of the Advertising Value of Media Content," Journal of Advertising Research, 2 (June, 1962), 28-33.

Three studies which explored the dimensions of the advertising value of media context are reported. The portfolio method, a ranking of a nonexistent company, and responses to coupons comprised the experiments. In each experiment, over 1,000 adults from a large metropolitan area served as subjects. A modified probability sample was employed. Chi-square and ranking procedures were used to analyze the data. The portfolio method and the method of ascribing attributes to a company showed that the context of an advertisement affected how it was perceived. The question of who perceives the commercial or advertisement in context is discussed. References are included.

3289
Witherington, H. Carl. "Readability of Textbooks in Educational Psychology," Journal of Educational Psychology, XLVI (November, 1952), 227-230.

The Dale-Chall readability formula was used to determine the reading grade levels of eight college educational psychology textbooks published in 1948, 1949, and 1950. The texts ranged in difficulty from grade 10 to grade 12 and were written at approximately the reading grade level of the students who were supposed to read them. The books analyzed were written by Gates and others, Guthrie and Powers, Cole and Bruce, H. A. Peterson, Boynton and others, W. C. Trow, Robert G. Simpson, and Herbert Sorenson. A step-by-step account of the analysis is given. Tables and references are included.

3168
Young, Kimball. "Content Analysis of the Treatment of the Marshall Plan in Certain Representative American Newspapers," Journal of Social Psychology, XXXIII (May, 1951), 163-85.

A content analysis of the treatment of the Marshall plan in certain representative American newspapers was made for the following four purposes: (1) to examine and interpret the nature and direction of the content which enters into the discussion of a public issue by means of certain recurrent themes, (2) by an analysis of these themes, to interpret certain aspects of public opinion formation through time, (3) to discover the relations, if any, between editorial policy of the newspapers and the kind and amount of news presented on the particular issue, and (4) to contribute to the method of analyzing the content of public opinions in process. The New York Times, the Chicago Tribune, and the Daily Worker, three newspapers with divergent points of view, were selected for study. Twenty-eight themes categorized as Pro, Left-anti, and Right-anti are listed for comparison. The findings and interpretations are illustrated with tables and figures. The study concluded that as measured by shifts in frequency of treatment and direction, external events play a part in fluctuations and probably in final decisions or consensus and that sharp differences in interpretation or view do not in time seem to diminish as far as editorial policy is concerned.

Supplementary References, 1900-1950

July 1, 1947 to June 30, 1948

2773
Sheldon, William. "An Evaluation of an Experimental Reading Program for Medical Students," Journal of Educational Psychology, XXXIX (May, 1948), 298-303.

Summarizes the results of an experiment with 16 freshmen and sophomore students to determine the effect of two fifty minute periods of training for nine weeks, including emphasis on speed and comprehension and discussions of various matters involved in the improvement of vocabulary, concentration, memorization, and reviewing and taking examinations.

July 1, 1946 to June 30, 1947

2628
Berger, Herman I. "The Difficulty of Third-Grade Health Readers," The

Elementary School Journal, XLVII (March, 1947), 391-95.

Compares the vocabulary of nine third-grade health readers with the Rinsland basic vocabulary of elementary school children.

2681
Rojas, Pauline M. "Reading Materials for Bilingual Children," *Elementary School Journal*, XLVII (December, 1946), 204-11.

Reports the results of a comparison of the vocabulary content of the pre-primers and primers of three basic series of readers.

July 1, 1944 to June 30, 1945

2500
Hurd, Archer W. "An Experiment in Reading Medical Literature," *Journal of the Association of American Medical Colleges*, XIX (May, 1944), 167-68.

Presents data showing the correlation between two methods of measuring speed and the correlation between speed and comprehension in reading medical literature in the case of 71 freshmen.

2511
Lannert, Violet and Ullman, Marguerite. "Factors in the Reading of Piano Music," *The American Journal of Psychology*, LVIII (January, 1945), 91-99.

Attempts to discover distinct factors in sight reading of music, to estimate their relative importance and to discover methods of dealing with them, through detailed analysis of performance of nine subjects under varying conditions.

2512
Lawrence, Armon J. *A Vocabulary of Business and Economic Terms of Popular Usage*. Bulletin of the Bureau of School Service, No. 3. Lexington, Kentucky. College of Education, University of Kentucky, March, 1945. pp. 134.

Reports 1,483 words with business and economic meanings and the frequency of their occurrence in current non-technical literature of high circulation (*Time* and *Saturday Evening Post*).

2519
Morgan, C. L. and Foltz, Mary C. "Effect of Context on Learning a French

Vocabulary," Journal of Educational Research, XXXVIII (November, 1944), 213-16.

Reports the results of a controlled experiment with two groups of 29 seventh and eighth grade pupils to determine the effect of context upon the formation of associations of French words with their English equivalents.

July 1, 1942 to June 30, 1943

2343
Gragg, Donald B. "The Contribution of High School Latin, French, and Spanish to English Vocabulary," Journal of Educational Psychology, XXXIII (November, 1942), 615-22.

Summarizes the results of a study to determine the potential contribution to new English words made by high school Latin, French, and Spanish, and incidentally by pre-high-school English.

July 1, 1940 to June 30, 1941

2109
Carroll, J. B. "Knowledge of English Roots and Affixes as Related to Vocabulary and Latin Study," Journal of Educational Research, XXXIV (October, 1940), 102-11.

Describes the derivation and reliability of a test of ability to recognize morphemes and their meanings. Reports data on the relationship between knowledge of morphemes, vocabulary development, and Latin study.

2137
Hansburg, Henry. An Experimental Study of the Effect of the Use of the Print Shop in the Improvement of Spelling, Reading, and Visual Perception. Teachers College Contributions to Education, No. 776. New York, Teachers College, Columbia University, 1939. pp. 84

Presents the results of a series of controlled experiments in grades 5 to 8 to determine certain psychological effects of printing activities, namely, to improve ability to spell, to decrease the reversal tendency, and to improve ability to read and comprehend.

July 1, 1939 to June 30, 1940

1985
Coleman, Algernon. English Teaching in the Southwest. Compiled for the Committee on Modern Languages of the American Council on Education. Washington, American Council on Education, 1940. pp. 308.

Includes summaries of numerous studies that contribute to an understanding of the problem of teaching English to the Spanish speaking population in the southwestern area of this country.

2001
Giduz, Hugo. "Outside Reading," Modern Language Journal, XXIV (December, 1939), 210-13.

Presents data showing the relationship between the amount of outside reading in second-year French in high school and grades in the course.

July 1, 1938 to June 30, 1939

1845
Bean, Kenneth L. An Experimental Approach to the Reading of Music. Psychological Monographs Vol. L, No. 6 (Columbus, Ohio, American Psychological Association, Inc., 1938). pp. 80.

Reports results of efforts to determine the complexity of the musical pattern that can be perceived at one fixation of the eyes by individuals with different amounts of musical training and experience, and to study the effects of practice with a tachistoscope on the span of perception of these individuals for various kinds of musical material.

July 1, 1937 to June 30, 1938

1838
Wooley, E. O. "Some Experiments in Teaching German Vocabulary," Twenty-Fourth Annual Conference on Educational Measurements, 21-27. Bulletin of the School of Education, Indiana University School of Education, Vol. XIII, No. 4. 1937.

Presents methods and results obtained in a series of studies to determine a basic German vocabulary, and amount of growth in vocabulary displayed by college students during the freshman year.

July 1, 1936 to June 30, 1937

1718
Struble, Marguirette M. "The Construction of French Reading Material for Second Year High School," Journal of Educational Research, XXX (February, 1937), 421-36.

Summarizes opinions and the results of experiments concerning the deficiencies and needed improvements in second year reading materials in French.

1733
University of New Mexico. We Learn English: A Preliminary Report of the Achievement of Spanish-Speaking Pupils in New Mexico. (Albuquerque, New Mexico, San Jose Experimental School, University of New Mexico, 1936), pp. 34 + 61 tables.

Summarizes the results of a five-year experiment with Spanish-American children to improve the efficiency and appropriateness of the instruction provided, with special emphasis on reading and speaking English.

July 1, 1935 to June 30, 1936

1598
Kelley, Victor H. "The Reading Abilities of Spanish and English Speaking Pupils," Journal of Educational Research, XXIX (November, 1935), 209-11.

Reports the results of a study among 692 pupils in grades 4 to 8, inclusive, to determine the reading abilities of Spanish and English speaking children and the particular phases of reading in which the Spanish speaking children are deficient.

1604
McElwee, Edna W. "Differences in Reading Attainment of Italian and Jewish Children," Journal of Applied Psychology, XIX (December, 1935), 730-32.

Compares the reading grades of 600 Jewish children paired with Italian children on the basis of mental age.

July 1, 1934 to June 30, 1935

1511
Ortmann, Otto. "Elements of Chord-Reading in Music Notation," Journal of Experimental Education, III (September, 1934), 50-57.

Reports findings in a preliminary study of one phase of music reading (vertical grouping of notes) and attempts a diagnosis of the principles underlying it.

1446
Cheydleur, F.D., and Henmon, V.A.C. "Foreign Languages," Psychology and Methods in the High School and College, 466-72. Reivew of Educational Research, Vol. IV, No. 5. Washington, American Educational Research Association of the National Education Association, 1935.

Summarizes the results of various studies published between January, 1931, and December, 1933, that relate to the psychology, methods and materials of teaching reading in the foreign languages.

July 1, 1932 to June 30, 1933

1296
Ludwig, Oswald A. "Vocabulary Study of Four Machine Shop Texts," Detroit Educational Bulletin, XVI (January-February, 1933), 4-7.

Presents the results of a study to discover some of the words in four typical machine shop texts whose meanings were not understood by 40 ninth and tenth grade boys.

July 1, 1931 to June 30, 1932

1150
Donovan, John J. "Selecting Primers for Non-English-Speaking Children," Elementary School Journal, XXXII (September, 1931), 30-33.

Presents the results of tests given to children of foreign parentage to determine the vocabulary difficulty of eight primers.

July 1, 1930 to June 30, 1931

1027
Coleman, Algernon. "A New Approach to Practice in Reading a Modern Language," Modern Language Journal, XV (November, 1930), 101-18.

Summarizes facts on which the author bases recommendations concerning methods of teaching students to read fluently a modern foreign language.

1028
Cornell, Ethel L. A Beginning Reading Vocabulary for Foreign Born Adults with Special Reference to Those Who Can Not Read in Any Language. University of the State of New York Bulletin, No. 948. Albany, New York, University of the State of New York, 1930. pp. 24.

Presents the results of an analysis of the vocabulary of eleven books for adult illiterates.

July 1, 1929 to June 30, 1930

911
Broom, M. Eustace and Brown, L. P. "A Silent Reading Test in French," California Quarterly of Secondary Education, V (October, 1929), 71-76.

Describes the content of a silent reading test in French, presents norms, and discusses the reliability of the test.

972
Pintner, Rudolf. "Speech and Speech-Reading Tests for the Deaf," Journal of Applied Psychology, XIII (June, 1929), 220-25.

Describes speech-reading tests and reports the results of their application to four hundred cases.

980
Seibert, Louise C. "An Experiment on the Relative Efficiency of Studying French Vocabulary in Associated Pairs Versus Studying French Vocabulary in Context," Journal of Educational Psychology, XXI (April, 1930), 297-314.

Reports the results of an experiment among sixty college students in second year French to determine the relative efficiency of different methods of acquiring a French vocabulary.

July 1, 1927 to June 30, 1928

697
Broom, M. Eustace. "A Silent Reading Test in Spanish," *Journal of Educational Research*, XVI (December, 1927), 357-64.

Describes the derivation and validation of a test to measure ability to read and comprehend sentences and paragraphs in Spanish.

772
Thompson, Helen. *An Experimental Study of the Beginning Reading of Deaf-Mutes*. Teachers College Contributions to Education, No. 254. New York, Teachers College, Columbia University, 1927. pp. 84.

Describes a controlled experiment to determine the effectiveness of a proposed method of teaching deaf-mutes in the first grade to read.

July 1, 1926 to June 30, 1927

583
Buswell, G. T. *A Laboratory Study of the Reading of Modern Foreign Languages*. Publications of the American and Canadian Committees on Modern Languages, Volume Two. New York, Macmillan Co., 1927. pp. 100.

Reports the results of an analysis of eye-movement records of elementary school and high school pupils and of college students in reading French, German, Spanish, and Latin.

614
Harlan, Charles L. "The Technical Vocabulary of Psychology," *Journal of Educational Psychology*, XVII (November, 1926), 554-57.

Describes the results of vocabulary tests involving psychological terms given to five hundred normal school students before and after the study of psychology.

653
O'Shea, M. V. *The Reading of Modern Foreign Languages*. Bureau of Education Bulletin, No. 16, 1927. pp. 78.

Summarizes and interprets the statements of more than seven thousand high school and college graduates concerning the use made of foreign languages after graduation.

659
Rowen, Lorene. "Directed Study in French," School Review, XXXV (March, 1927), 222-26.

Describes methods of teaching reading in beginning French and presents the results obtained in terms of number of pages and scores on standardized tests.

674
Tyler, Caroline. "A Study of Vocabulary in Beginning Latin Textbooks," Educational Research Bulletin (Ohio State University), V (October, 1926), 285-92.

Reports the frequency in eight beginning Latin textbooks of the fifty words in form A of the Henmon Latin test.

677
West, Michael. Bilingualism (With Special Reference to Bengal). Occasional Reports, No. 13. Calcutta, India. Government of India, Central Publications Branch, 1926. pp. 354.

Presents a detailed account of the methods used among native children of high school age in Bengal in developing ability to read English silently. Also summarizes the results of the experiment.

678
West, Michael. Learning to Read a Foreign Language: An Experimental Study. New York, Longmans, Green and Co., 1926. pp. 56.

Reports the results of an experiment in Bengal in teaching native Indian children of secondary school age to read English.

July 1, 1925 to June 30, 1926

528
Gates, Arthur I. "Methods and Theories of Teaching Reading Tested by Studies of Deaf Children," Journal of Educational Research, XIV (June, 1926), 21-32.

Discusses problems of teaching deaf children to read. Presents the results of a study to determine the value of teaching language to deaf children by means of printed words.

204
Judd, Charles H. and Buswell Guy T. *Silent Reading: A Study of the Various Types*. Supplementary Educational Monographs, No. 23. Chicago, Department of Education, University of Chicago, 1922. pp. 160.

Discusses the effect on reading habits of changes in the content and purpose of reading, distinguishes analytical study from reading, and describes characteristic eye movements in reading foreign languages.

382
Thorndike, Edward L. "The Influence of First-Year Latin Upon Range in English Vocabulary," *School and Society*, XVII (January 20, 1923), 82-84.

Presents conclusions concerning the influence of first-year Latin on range in English vocabulary as shown by records secured from freshmen in fifty-six high schools.

383
Thorndike, Edward L. The Influence of First-Year Latin Upon Ability to Read English," *School and Society*, XVII (February 10, 1923), 165-68.

Reports a study of the influence of first-year Latin on ability to read English. Reading ability measured by means of the Thorndike-McCall reading scale.

384
Thorndike, Edward L., and Ruger, G. J. "The Effect of First-Year Latin Upon Knowledge of English Words of Latin Derivation," *School and Society*, XVIII (September 1, 1923), 260-70.

Presents conclusions concerning the effect of first-year Latin on knowledge of English words of Latin derivation as shown by records from ninth-grade classes in forty-one high schools.

444
Bovee, Arthur G. "Grammatical Knowledge and Reading Ability in French," *Journal of Educational Research*, XI (March, 1925), 204-12.

Discusses the relation between the results of a test of grammatical knowledge and the results of a test of comprehension in French.

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